



## **Unpacking tenure security**

Development of a conceptual framework and application to the case of oil palm expansion on customary land in Kapuas Hulu district, West Kalimantan, Indonesia

Johanna Clerc



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AgroParis Tech ENGREF

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Oil palm plantation in Kalimantan, Indonesia

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# 1. Introduction

For more than 50 years social scientists have studied property rights with the aim of understanding what kind of institutional setting allows optimal management of natural resources for the maximisation and maintenance of human well-being. Land rights security is generally included in this research as one of the conditions required for acceptable and sustainable natural resource management.

From the perspective of classical economical theory, property rights security is a critical incentive for investment in land because it guarantees the right holder will reap the benefits of their investment. Land rights security also gives the right holder access to credit because the land can be used as collateral.

Land rights security plays a key role in securing access to food, especially in rural areas where local livelihoods are based on the direct exploitation of natural resources (see Maxwell and Wiebe 1998). It is related to social equity, as land tenure insecurity and land access may link to rural poverty and social position. In addition, land tenure security, by reducing the likelihood of competitive claims, can decrease land-based conflicts, thus contributing to social order and peace.

The concept itself and the factors securing land rights have only recently been studied empirically. The theory has evolved from a static concept related to the holding of private and individual land titles to a multidimensional and complex concept. This makes its study difficult as it is expressed in different ways according to context (Mwangi and Markelova 2009) and cannot be uniformly estimated using a set of fixed indicators that are valid everywhere.

This research is part of the ‘Collaborative land use planning and sustainable institutional arrangements for strengthening land tenure, forest and community rights in Indonesia – CoLUPSIA’ initiative, a CIRAD (French Centre of International Agricultural Research for Development) project funded by the European Commission, and run in partnership with CIFOR and other partners.

The main goal of the project is to establish more collaborative and equitable land use planning and natural resource management (NRM), and the present work covers one of its specific objectives: exploring property rights, tenure systems and factors at multiple governance levels that enhance or constrain security of access for local people, especially forest dwelling or forest adjacent communities, in Kapuas Hulu district, West Kalimantan, Indonesia. This district is subject to large-scale land use change related to the development of oil palm plantations by private companies. A conceptual framework is developed to facilitate an empirical study of the factors influencing land tenure security and access in the context of land use rights transfer to a private company.

The paper first presents a brief summary of concepts relating to tenure security, which are then used to develop a conceptual framework. In the final section this framework is applied to a case study of Kapuas Hulu district.

## 1.1 Overview of concepts

### 1.1.1 Tenure security

Tenure security corresponds to the certainty that a right holder will not be arbitrarily deprived of his or her rights in the present or future. It depends upon a range of rights, their assurance and duration (Fuys *et al.* 2008). Because tenure comprises a bundle of rights, individuals and groups can have multiple simultaneous and/or sequential rights to land and land-based resources. These rights can be interdependent and based on diverse local arrangements. Thus the concept of tenure security cannot be reduced to being simply equivalent to losing a parcel of land. Land can be a bundle of resources rather than a geometric area, where multiple tenure determines the access to these resources. Benefits may be tangible, e.g. in terms of goods extracted or rent from tenants, or intangible, e.g. an emotional or cultural bond to the land. Here land tenure security is defined as the assurance that the right holders can exercise their right now and

in the future, and be able to reap the benefits of the labour and capital invested in the resource.

### 1.1.2 Land rights

To understand tenure security fully, the concept of land rights must be addressed. Research has focused on finding the best way to manage natural resources efficiently, maximising the benefits to society while simultaneously preserving them for the next generation. In his seminal paper, 'The tragedy of the commons', Hardin (1968) demonstrated that open-access situations inevitably lead to resource depletion, and thus private or state control is required. This forms the basis of the property rights school which believes that private, individual and tradable property rights form the most efficient tenure system because they encourage management efficiency as owners reap the benefits and bear the costs of their actions; rights are transferable and subject to market-based mechanisms allowing those best able to use the land to own it. Rights are ensured by the State (Ellsworth 2002).

Building on this, Demsetz proposed that property rights evolve with economic and demographic development (evolution of relative prices), with an internalisation of externalities reaching a state of private individual property rights.

This led to the belief that Western style systems were better than traditional tenure systems at promoting economic development. These policies were expected to increase land tenure security and regulate the use of natural resources through the formal recognition of existing private property rights and the introduction of land titles. However, when implemented, many of these policies failed due to a lack of well-defined property rights, efficient land markets and the cost of enforcing rights (Acheson 2006). Under this system, many vulnerable users, such as the poorest and women, were disenfranchised, their rights being threatened rather than secured (Nyamu-Musembi 2008).

In contrast to the property rights school, the common property school, which emerged in the 1980s, focuses on traditional resource management practices and the benefits of collective action. Property rights are maintained but they are exercised collectively. Common property systems allow resources to be shared across environmentally variable areas, decreasing the uncertainty with which an individual can make a livelihood (Thompson and

Wilson 1994). They also facilitate the management and use of transitory resources such as fish and game, which would be impractical to privatise (Bruce 2000). This school of thought led to the concept of a bundle of rights that can be held separately or collectively, and encompasses the idea that one land has different resources that can be used and managed by several different individuals. The notion of tenure security should consequently be modulated and adapted according to the resource and the kind of right considered among the bundle of rights and the related property rights regime.

### 1.1.3 Political and institutional perspectives

The application of common property policies has had mixed results and there is growing recognition that community-based natural resource management and common property regimes ignore social differentiation and its implications (Leach *et al.* 1999). Even collectively formulated rules on the allocation of rights and responsibilities to a common resource may not be equitable, and can result in unequal powers among the community of owners (Agrawal 2003).

The institutional landscape shaping land rights exercised on a land is often characterised by the existence of different and overlapping attributions of property rights backed by different authorities (e.g., religious, state, user groups, customs). Although these may complement each other, they often create uncertainty, because, without coordination, the rights attributed by one authority may be ignored or suppressed by another (Meinzen-Dick and Pradhan 2002). However, the rights that are actually exercised are often an outcome of the interaction of the various legal orders existing and depend on the relative power of each institution and on the right holders' ability to mobilise them to legitimate their claims and behaviour (Lund 2001, Meinzen-Dick and Pradhan 2002). Consequently actual property rights are not static and their security may change with time. Tenure systems should therefore be viewed as dynamic, continuous and relative.

## 1.2 Land tenure security

Tenure security depends on many social, political and institutional factors that change over time. It is difficult to measure directly but can be approached by studying indicators, such as the degree of investment made in the land, ownership of title deeds, who exercises the bundle of rights or how

the land was acquired, that will change according to the situation, as tenure security expresses itself in various forms. To help identify the most relevant approach and make the concept operational, we need a conceptual framework that can be applied to most situations and that accounts for the dynamic and multi-dimensional nature of tenure security,

including the underlying power issues and the idea that land rights are constantly renegotiated.

The next section presents a conceptual framework for tenure security, based on the institutional analysis and development framework developed by Elinor Ostrom *et al.* (1994).

## 2. A conceptual framework for tenure security

### 2.1 General framework for institution analysis

The general framework presented here is based on the institutional analysis and development framework developed by Ostrom *et al.* (1994). This conceptual framework comprises ‘(1) an exogenous set of variables that influence (2) situations of actors and (3) the behaviour of actors in those situations, leading to outcomes, which then feed back to modify both the exogenous variables and the actors and their situations’ (Dorward and Omamo 2009).

Here exogenous variables constitute the ‘environment’ which influences the action situation and the behaviour of the actors, positioned in the ‘action arena’, the core research unit corresponding to ‘social spaces in which actors interact in social and economic exchange’. In our case, this is the village.

The action situation is characterised by the ‘(1) participants (who may be either single individuals or corporate actors), (2) positions, (3) potential outcomes, (4) action–outcome linkages, (5) the

control that participants exercise, (6) types of information generated, and (7) the costs and benefits assigned to actions and outcomes’ (Ostrom 2005).

Actors are those who use or have rights to the most valued natural resources, as well as those who are involved in the application of these rights.

It is important to delineate the border between the action arena and the environment. The actors and institutions that affect the action arena, but are little affected by the outcomes of the action arena on the temporal scale considered are treated as part of the environment (Dorward and Omamo 2009).

### 2.2 Application to land right security

#### 2.2.1 General overview

The framework focuses on tenure security, forest and land, at the level of forest dwelling or forest adjacent communities. It is supposed that these communities have some characteristics (e.g., a certain number of members, social norms shaping relations, the degree

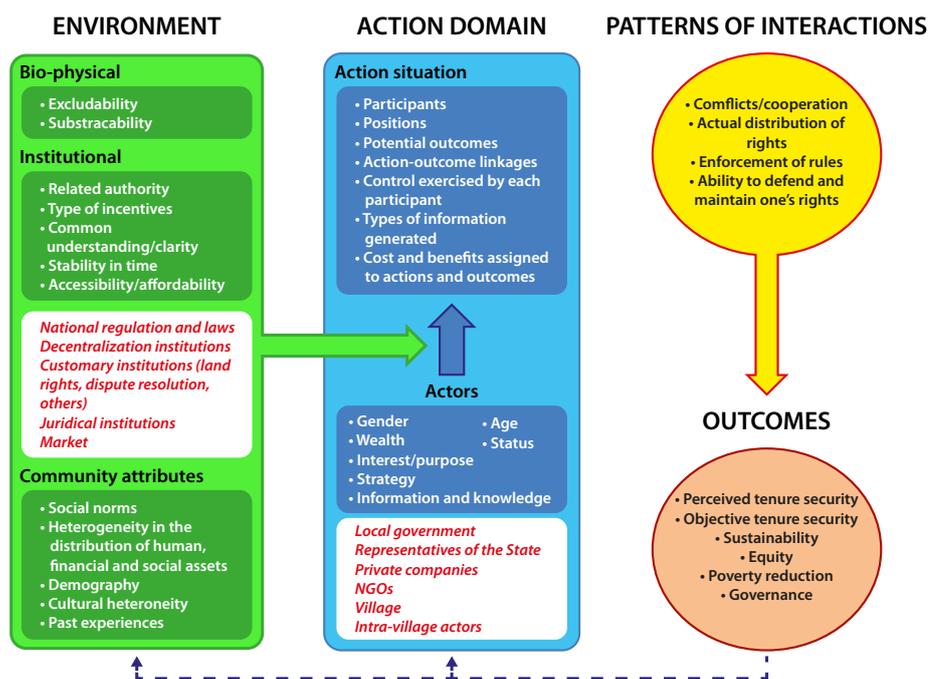


Figure 1. Institutional analysis and development framework applied to tenure security

of heterogeneity related to wealth) that strongly influence the way their members interact with one another regarding the natural resources of the forest and land under their control. At the same time, the characteristics of the biophysical environment, including the forest itself, other lands, natural resources used and also the different infrastructure and geography of the area, influence them, within a broader political and institutional context.

These exogenous variables influence different decision-making entities, or actors, who interact with forest and land. All actors have some direct or indirect interests and goals concerning forest and land in the area of the village. They may be direct users of the resource, villagers or outsiders, an individual or group; they may represent an institution regulating the use and the management of the forest, or an NGO. They are connected to institutions which define rules governing the attribution of use and management rights of the forest. Each of these institutions can represent a constraint or an opportunity regarding the goal of each actor, and the enforcing of each rule depends partly on the strength of the related institution.

In the action arena, each actor has a certain position in the constellation of power, and a set of rights and duties dictated by the institutions. The question of which rights or duties are attributed to whom depends on the rules, and also on the ability of each actor to control the process of rule formulation and enforcement.

As a pattern of interaction, whether or not these rights and duties will be enforced and translated into practice will depend on the capacity of the related authority to ensure their enforcement, but also on the ability of each actor to claim, maintain and defend their rights. Another, but related, pattern of interaction is the degree of compliance of actors to the institutions' rules. The degree of conflict and cooperation and collective action are outcomes of the strategy adopted by the actors. These dimensions of the patterns of interaction can be considered as indicators of *de facto* or objective tenure security. If rights are not enforced, the assurance of the right holder to exercise his or her rights is very low. For example, in the case of a common-pool resource where there is a rule limiting the amount each user is allowed to extract, if this rule is not enforced, some users may withdraw more from the resource than the others, reducing the stock left and the benefits others can

get from the resource. The more a right holder is able to defend his or her right, the lesser the probability it will be lost.

The patterns of interaction are expected to have general outcomes in terms of perceived tenure security, objective tenure security, poverty reduction, sustainability, equity and democracy, which, in turn, will transform the environment and the action arena.

### 2.2.2 Actors

Several actors play a role in tenure security. These include national and regional actors, such as national and local government officials; private groups, such as NGOs and private companies; other villages; and village-level groups, including decision makers, users, individuals and demographic groups based on gender, age, wealth, etc.

Each actor is characterised by the actions it can undertake and the potential outcome: the action resources. According to the environment and the other actors in the action arena, action resources can be mobilised and determine the potential degree of control each actor can have on the action arena.

The following are important in determining action resources:

- Information: how actors acquire information, the kind of information and how actors use it. Information increases the control that an actor can exercise and bargaining power when negotiating with other actors.
- Social status: influenced by gender, age, wealth, ethnicity, etc. Social status influences the control that can be exercised in the action arena and the accessibility of authority and decision-making entities.
- Interests, and the purpose and strategy adopted to reach them.

### 2.2.3 Institutions

Institutions are formal and informal rules governing people's behaviour by providing a framework of incentives. There is a dynamic relationship between institutions and actors. It is important to identify these when considering land rights. In the case of tenure security, customary and statutory (both at the national and regional levels) authorities devising the rules for the attribution of use and management rights have to be identified, as well as those involved in dispute and conflict management.

The attributes of institutions that are likely to affect interactions with actors include related authority, types of incentives, the degree of common understanding, accessibility and affordability (how actors can defend their rights and the degree of participation in devising rules) and the perceived legitimacy of the authority.

### 2.2.4 From the action situation to patterns of interaction

#### The action situation

The action situation is shaped by a combination of actor's interests, their relative power in bargaining situations and the different rules of the game which are likely to be applied by each actor.

For example, an actor may hold one of three positions in the action arena:

- Right holder: each right holder has at least one set of property rights over the land, backed by the related authority/institution. One actor can be given different sets of rights by different authorities.
- Land right backing authority (customary institution or local or central government institutions):
  - Rule devising actor: decides how rights are attributed, related conditions and complementary duties
  - Rule enforcing actor: responsible for enforcing the decisions of the rule devising actor
  - Conflict management actor
- Other actors: do not have property rights on the land considered, nor do they represent a property right backing authority. However, they have interests in the resource considered, e.g. they may want to benefit from it or they can potentially constrain right holders in the exercise of their rights (e.g., private companies), or they try to influence the way the right holders use it (e.g., environmental NGOs).

#### Allocation of key rights

Here, the main distinction is between primary and secondary land rights, i.e., the difference between those who have only land use rights (secondary rights) and those who control the land and who make decisions about its management, the persons allowed to use it and associated restrictions (Cousins 2009). With the nationalisation of former common property lands in many developing

countries, the State put the individuals using the land in very insecure situations, resulting, in some cases, in the loss of their use right. The State gave them usufruct rights, and reserved for itself the right to control the land, e.g., by granting concessions to private interests.

In this kind of situation, use rights to a resource are attributed by the arbitrary power of an authority, resulting in high tenure insecurity. However, this does not mean that use rights held alone are systematically less secure than complete property rights. Such an idea would imply that private property rights are systematically more secure than other kinds of land rights, confusing tenure security with full command over land (Lund 2000).

#### Accessibility of institutions regulating land rights

Tenure security depends also on the way rules are devised for the allocation of rights, their content and conditionality, the accessibility and space for participation by resource users in the decision-making processes, and more broadly in the institutions regulating the distribution of land rights. 'A key political issue is therefore where and with whom the institutions for the management of land are found (national government, district, local, etc.) and the degree of control which different groups are able to exert on them' (Lund *et al.* 2006).

The question of the accessibility to such institutions is related to constitutional rules (a part of the environment), namely, the rules determining who is entitled to make collective-level decisions. These rules are also related to social norms of the community and customary tenure systems. Whereas customary rules often maintain common property systems that are generally perceived as guaranteeing equity, they can be discriminatory and exclude certain categories of actors, especially women, from the control of the land (Whitehead and Tsikata 2003). For each actor, these factors delineate the action they may undertake as well as the potential outcomes and risks.

#### Confusion around land rights rules

Another important feature is the clarity of the rules themselves. As identified by Ostrom (1990), the main function of institutions is to make the behaviour of others predictable through rules. If within one legal order the rules are not clear, they leave space for interpretation by individuals and then it is more likely that these interpretations will be contradictory and arbitrary, undermining the

predictability of others' behaviour. This is the case within coherent legislation that is formulated in ambiguous terms.

Often there are overlapping legal orders and institutions, and if there is no coordination between them, and they conflict, there is uncertainty about which law should be applied (Meinzen-Dick and Pradhan 2002). While one tenure system might dominate the other and weaken or erase the rights backed by the dominated system (which is one cause of tenure insecurity), the coexistence of different legal orders, none of which is completely dominant, can also create insecurity and have the same effect as unclear rules (see Lavigne-Delville 2000 for West Africa).

In most developed countries, the institutional environment is marked by land reforms aimed at solving the problem of legal pluralism. There are two main approaches. The first corresponds to the registration of existing rights and the allocation of land titles. However, in many cases this approach failed to reach smallholders completely, partly because of the costs of registration (Firmin-Sellers and Sellers 1999) and the difficulty in registering overlapping or secondary rights to land, resulting in the weakening of such rights in regard to the primary rights that were registered. Often attempts to replace customary practices with private property titles have resulted in even more confusion and land insecurity: 'unsuccessful attempts to substitute state titles for customary entitlements may reduce security by creating normative confusion, of which the powerful may take advantage' (Bruce *et al.* 1994: 260, cited in Cousins 2009).

The second approach is codification, which promotes giving official recognition, under national legal codes, to diverse local institutions and patterns of access to and control over resources (Unruh 2006). But integrating diverse, dynamic, flexible and sometimes imprecise customary practices into national regulation is a very difficult task (Unruh 2006; Lavigne-Delville 2000).

A hybrid approach combining customary and formal law is proposed by Lavigne-Delville *et al.* (2002). This consists of 'reforming rules and procedures for land rights management, including arbitration, rather than formalising land rights themselves'. With the aim of reducing 'ambiguity about which norms are legitimate' (Lavigne-Delville, cited in Cousins 2009), stakeholders adopt a system of shared rules at a local

level but 'within a hierarchy of arbitration bodies located within a framework of national law' (Cousins 2009). The focus is on decentralising and devolving authority to give more certainty and clarity to the allocation of authority to make decisions on land rights and use.

Nevertheless, all approaches tend to favour the most powerful claimants at the expense of the weakest ones. When analysing tenure security, it is then important to look at the strategy that has been chosen by the State to formalise land rights, creating opportunities and constraints that vary among the different actors in reinforcing their claim and their control on the attribution of the land rights.

### **Unclear rules and tenure security**

When there is confusion about the rules that are applied, the attributes of the actors and their position in the game of power will have a strong role in shaping the security of their land rights.

Political power and membership of the administration put some actors in a favourable position enabling them to take advantage of unclear rules on land rights, because they are 'the only ones able to master the legal and administrative complexities' and they have an interest in such a confusion, which they may also maintain. Proximity to political power, access to strategic information and financial resources are important assets that can be mobilised to ensure one's tenure security, and conquer new rights (Lavigne-Delville 2000). However, in the absence of such assets, actors may try to adopt the strategy of 'forum-shopping', manipulating the different norms underlying each legal order for their own interest (Meinzen-Dick and Pradhan 2002). It is important to identify whose rights security is affected by unclear rules and who has interest in maintaining the confusion as a strategy.

The existence of different overlapping legal orders is also a threat to land tenure security because it creates more opportunities and space to contradict claims, and thus a higher probability of a right being challenged. As stated by Lund (2001), with the Code Rural of Niger, the problem with legal pluralism is the existence of multiple arbitration authorities, with an unclear repartition of responsibilities. The existence of different overlapping legal orders can then be used by right claimants to legitimatise a behaviour that would otherwise not be tolerated, e.g., when an outsider refers to legal regulation to justify

his claim on a resource held under customary laws by local inhabitants (Meinzen-Dick and Pradhan 2002).

### **Enforcement of rules and *de facto* rights**

Indeed, even clear rules, designed in a participatory way with possibilities of harmonising statutory and customary land tenure can be useless if not enforced and the *de facto* tenure security can be low, because of a lack of enforcement of the rules devised to enhance tenure security.

Statutory rules can suffer a lack of enforcement at the national level, because of the incapacity of the State to enforce them. The difficulty of translating laws into reality is a problem for weak states, although this does not mean that the State has no influence on the attribution and maintenance of land rights. 'Even with serious loss of "managerial" capacity, the state is rarely irrelevant in the way that access is granted to large scale entrepreneurs, and how different connections are formed and institutionalized' (Lund *et al.* 2006).

This implies that tenure security in a situation of weak statutory law enforcement depends little on formal rules, but rather on informal rules, which might be very distant. For example, Berry showed that actual and informal criteria for the attribution and the access to resources in Africa were based on social status and membership in social networks (Berry 1993).

The lack of enforcement can be due to a lack of material means, but this can be the outcome of a lack of political will to enforce the law. Statutory laws aimed at enhancing tenure security for vulnerable people can also fail because of complex procedures, making them impossible to apply.

At national and regional levels, rules should be actively enforced and monitored, especially for the large-scale implementation of a regulation. However, at a local level, rules can be enforced without such specific actions. Cleaver (2000) shows for a village in Zimbabwe that common social norms can be sufficient for rules to be enforced. We see then that the legitimacy of a rule or an institution, as well as the social norms shared inside the community are also important for tenure security because they facilitate the enforcement of rules.

### **Conflicts**

Tenure security is closely related to the issue of land conflicts, and the importance of competing claims

on the same land or resource is inversely related to the tenure of the people actually exercising rights on it. Conflicts can appear and threaten land rights at different levels. They can occur between local communities and the State or outsiders, but also among communities.

Many factors can trigger or escalate land conflicts. When the biophysical environment is characterised by increasing pressure on resources, which can be the case with population increase, immigration, environmental degradation or the commoditisation of previously auto-consumed products (a trend related to the integration of rural communities into a wider market economy), conflicts may arise between the different users. More generally, an increase in the value of land resources is likely to trigger conflicts (Fuys *et al.* 2008). The biophysical environment plays an important role, both because the value of a resource is linked to its scarcity, but also because the integration of a community into a market economy is closely related to its proximity to economic centres, and even remote places can become effectively closer through the construction of infrastructure (e.g., transportation).

An institutional environment marked by legal pluralism creates multiple and often incompatible criteria of legitimacy, with no general agreement on a hierarchy among those criteria. It can thus be a factor promoting land conflicts and also aggravating them: it creates opportunities for competing claims, but also the plurality of the arbitration mechanism makes it difficult to solve land conflicts (Lund 2001).

However land conflicts can also occur because of a change in the institutional environment that creates competition between some actors in the action arena. This is what happened, for example, with the Honduran land-titling project launched in 1982 (Jansen and Roquas 1998). As with many other land tenure reforms, it aimed to establish tenure security through land registration and titles. However, it succeeded only in replacing the causes of insecurity with others. It triggered many conflicts inside families and households, mainly because the titles had to be registered in the name of one individual only, and because it limited the total area one owner could register, compelling him or her to register the rest in someone else's name. In addition, a fee had to be paid (although the amount was considered reasonable).

Conflicts can also be the result of the strategies adopted by the actors to reach their goal, especially

when coercive power is used, which is particularly likely in action arenas with a strongly unbalanced repartition of power between actors. Such practices often face contestation and resistance, and result in a conflict situation. In Sudan, for example, the government issued a new law in 1970 stating that all unregistered land (which was actually owned under customary tenure regimes) would be converted into government land. This enabled the State to allocate the land to foreign and local investors as it chose. According to Wily, this violation of customary land rights 'was an important trigger to civil war and persists as a factor in continuing conflicts' (Wily 2006).

However, conflicts are not inevitable, they are part of social life, what is more important is the capacity to solve them. The existence of clear and effective mechanisms to manage conflicts is consequently a key dimension for tenure security (Fuys *et al.* 2008).

Conflicts and competing claims in themselves are related to weak tenure security, but the way they are solved and arbitrated is also critical for tenure security.

### **Protection of challenged land rights by authorities**

Having secure land rights implies a high certainty for a right holder that when challenged, his or her right will be effectively protected by the right-backing authority. The functioning of justice depends on four interacting elements:

- the strength of the authority (i.e., its power to make its decisions respected by society),
- the willingness of the authority to protect the rights,
- the accessibility of the authority,
- the ability of the right holder to mobilise it.

A right protected by a weak authority can be easily violated and lost. Several factors influence the strength of an authority or institution.

First, an authority can impose its decisions by the use of coercive power. However, when this is not accompanied by a form of social acceptance, we cannot truly speak of authority, and often such practices face a strong contestation and resistance which undermine them. Authority requires legitimacy from the point of view of the society, and the strength of an authority (or an institution) is strongly related to its degree of social acceptance. Here also, the institutional environment plays an important role because the coexistence of multiple

authorities whose legitimacy is based on different criteria, but who rule with different codes on the same issues, weakens the strength of each of them. The legitimacy of an authority is related to its adequacy with social norms. However, legitimacy is the result of a legitimisation process: 'Institutions do not embody intrinsic legitimacy [...] What is legitimate varies between and within cultures and over time, and is continuously (re-)established through conflict and negotiation' (Sikor and Lund 2009). The legitimisation process can also involve the use of coercive power and violence, as 'there is no reason to expect that the quest for legitimacy is conducted by legitimate means alone, especially if one recognizes that what may be illegitimate to some may be seen as legitimate by others' (Sikor and Lund 2009).

The question of the willingness of an institution to protect right holders is therefore also closely related to the broader issue of corruption and elitism.

Yet, often, right holders' security is also not ensured because of the inaccessibility of the institutions supposed to protect them. This can result from complicated procedures and geographically distant, overloaded or costly institutions.

The ability to mobilise the institutions of justice can vary among the claimants; this aspect relates to the capacity of each actor to defend one's right, which depends on their attributes, such as their social status, their wealth and their degree of information; these factors often being interrelated.

To defend rights, rights holders must be aware of the existence of the rights and the rules pertaining to them. Documents that demonstrate the legitimacy of the rights are an important asset (Fuys *et al.* 2008). However, access to these documents is often actor-dependent. For example, registration of rights may involve a cost beyond the reach of some poorer customary land owners.

## **2.3 Conclusion**

The framework developed aims to encompass the different dimensions of the notion of tenure security and describe its connection with important variables concerning the biophysical features of the resource, attributes of the actors, community and land rights institutions. This is based on various theories and empirical examples developed in economic, political and anthropological literature. It is helpful to

consider these variables and their interrelationships when studying tenure security. There is neither a universal explanation nor definitive solution to secure land rights and it is crucial to undertake empirical studies to determine what factors impact the security of the tenure in each context. Figure 2 presents an overview of the main factors influencing tenure security.

The way tenure security expresses itself and the factors securing rights can vary greatly between different categories of right holders. Each category exercises a particular bundle of rights that should be determined. These rights can be given by an individual, and be the result of an arrangement between individuals, or by an institution representing an authority, and be the result of an arrangement between the right holders and society. When two individuals make an arrangement, they are linked by a contract that can be explicit or implicit, formal or informal. We consider that there is institutional supervision whereby the individual can request the protection of an authority in case of violation of the contract and this strengthens the security of the rights acquired through the arrangement.

In the case of a right that is granted by society through an institution, the attribution of the right can be the outcome of the enforcement of some rules governing the choice made by the people

representing the institution or the result of arbitrary choices. The existence of (applied) rules supervising rights allocation is a factor that reduces the arbitrary power of the backing authority, hence enhancing tenure security for right holders. If the right holders are involved in the decision made about the resource over which they have rights, their control over it and their tenure security are higher.

Another critical dimension for tenure security is the effect of conflicts over the resource. Conflicts arise in the presence of competing claims that are favoured by the coexistence of overlapping and contradicting legal orders (institutions), unclear or ambiguous rules for right attribution and high pressure on the resource. Conflicts, however, can be solved by effective and accessible dispute-management mechanisms, which are less likely in case of competing institutions.

The right holders are not powerless. They have social, economic and human assets that might be unequally distributed, and that they can mobilise to secure their rights in presence of potential threats such as arbitrary authority, externally imposed rules or competing claims. According to their assets and their choices, they might adopt strategies to secure their rights, or extend them, by manipulating overlapping legal norms, investing in social relationships, or engaging in collective action in the face of powerful and threatening actors.



# 3. Case study

## 3.1 Background

### 3.1.1 Oil palm plantations

Driven by an increasing global demand for edible oil and biofuel, worldwide oil palm production rose from 120 million tonnes of fruit in 2000 to 207 million in 2009, a growth of 70% in 10 years (FAOSTAT 2010). Although palm oil prices dropped as a consequence of the 2008 economic crisis, they are already recovering and the demand for palm oil is expected to keep on growing. In 2008, Indonesia was the second biggest producer of palm oil in the world, after Malaysia, according to the FAO.

In 2009, Indonesia had 5.2 million ha of oil palm plantations, representing approximately 10% of the agricultural area. The government plans to increase the national crude palm oil production from 19.2 million tonnes in 2008 to 40 million tonnes by 2020 (Ministry of Agriculture of Indonesia 2009 in

Feintrenie *et al.* 2010). Under such circumstances, the area of oil palm plantations is expected to increase throughout Indonesia, especially on the outer islands.

Oil palm plantations have a negative impact on the environment through deforestation, destruction of biodiversity, water pollution and carbon emissions (Sheil *et al.* 2009). The competitive use of oil palm for biofuel production is also a potential threat for the food security of poor people. However, the impact of oil palm plantations on the livelihood of local communities is not fully understood. While it can foster their economic development, serious social issues have also been reported. Much of the information is provided by NGOs or oil palm companies, and there is a need for objective research (Sheil *et al.* 2009; Rist *et al.* 2010).

In Indonesia, several conflicts affecting local communities related to oil palm plantations have

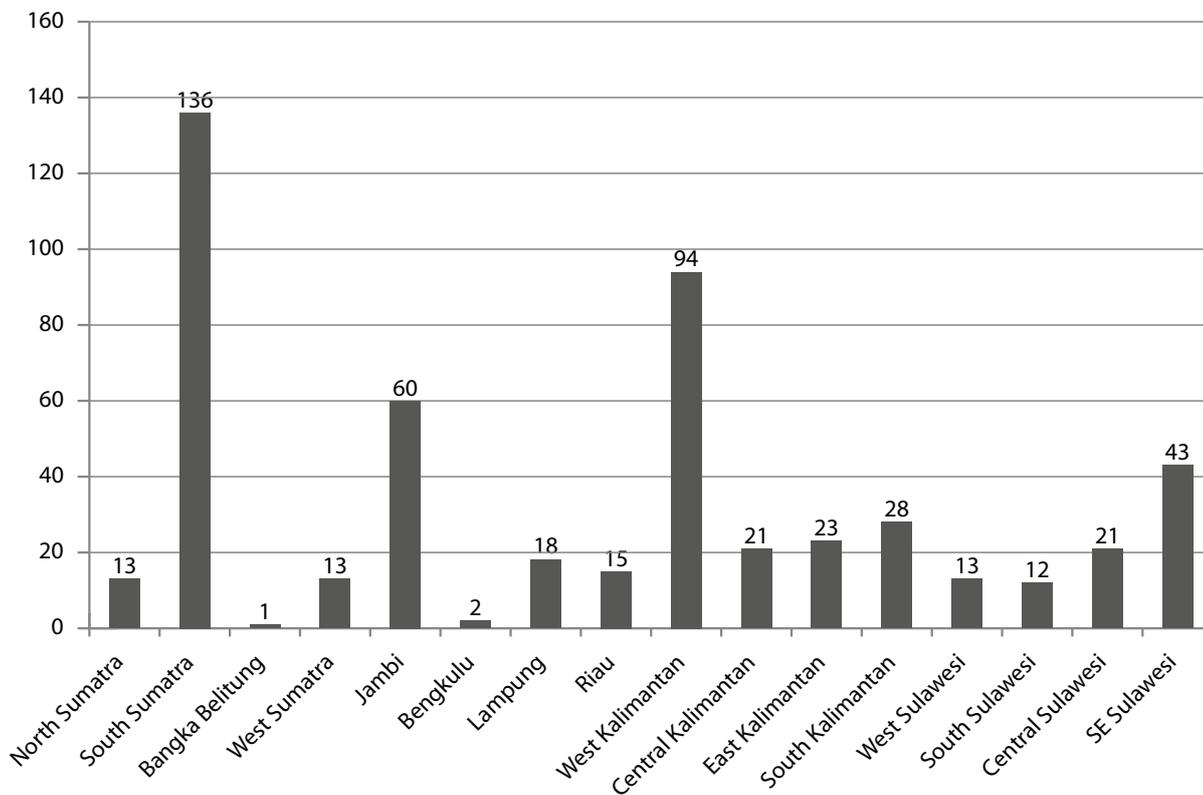


Figure 3. Oil palm conflicts by province in Indonesia, 2008

Source: Marti (2008, p. 40), data on conflict compiled by Sawit Watch

been reported. Some of them involve serious human rights violations and ‘land grabbing’. Figure 3 shows that the study area, West Kalimantan, has the second highest conflict rate of Indonesian provinces. Low wages and debts for oil palm plantation smallholders may lead to impoverishment. In addition, the compensation paid by oil palm companies to the local communities is often very low and their promises not completely fulfilled, which can trigger further conflicts (Colchester *et al.* 2006; Marti 2008; Sheil *et al.* 2009; Sirait 2009).

### 3.1.2 Land rights in Indonesia

Practices regulating land rights in Indonesia have been shaped by a legal system inherited from the Dutch colonial authorities, successive government policies, local customary institutions and social evolution. The current institutional context is complex and fails to provide equity, security and social peace. According to the head of the National Land Agency of Indonesia, in 2007, 7491 serious instances of land conflict occurred throughout the country (Winoto 2009). Winoto underlines the need for ‘serious agrarian reform’ because current land legislation and policies handicap economic development and equity; the recognition of customary rights by the government is critical for tenure security and has been the focus of many studies (Fay *et al.* 2000; Moeliono and Limberg 2004; Contreras-Hermosilla and Fay 2005; Colchester 2006; Colchester *et al.* 2006; Levang and Buyse 2007; Dahal and Adhikari 2008; Marti 2008; Moeliono *et al.* 2009; Sirait 2009).

Following the independence of Indonesia in 1949, the idea of *adat* (‘custom’ in a broad sense) and ethnic diversity were mobilised to shape the nation’s identity, and the choice was made to base the Indonesian legal system on ‘*adat* principles of consensus and common good’ rather than ‘Western majority rule and individual rights’ (Harwell 1997). The Indonesian Constitution, amended in 2002, includes both a partial and conditional recognition of customary institutions and land rights in general and the recognition that the State is entitled to take under its control any natural resource (including land) if it is in the national interest: ‘The earth, water and natural resources are under the control of the State and should be utilised for the maximum welfare of the Indonesian people’ (Article 33 of the Indonesian Constitution). In addition, Article 18B of the amended Constitution weakens customary land rights by allowing their recognition ‘as long as

they still exist and accord with development of the society and the principles of the Unitarian State of the Republic of Indonesia, as regulated by law’ (Sirait 2009, p. 22).

The Basic Agrarian Law of 1960 was a key step in the implementation of the Constitution and providing a stronger basis for customary right protection. It confirmed the constitutional right of the State to control all unclaimed land and resources while recognising customary rights (designated in the law as *ulayat* rights) under certain conditions (Articles 3 and 5). In fact, *ulayat* rights are applicable to lands not owned by the State, as long as they do not interfere with national interests or the common good. The validity of *ulayat* rights is strongly restricted by Article 5:

Nevertheless, it is not acceptable for customary law communities to invoke *ulayat* rights to oppose business utilisation rights, since such concessions are granted in certain regions to serve the wider interest. It is also not acceptable for customary law communities to use their *ulayat* rights to oppose development projects, for example opposing forest clearing for generating local income or resettlement programmes.

While this law formally recognises customary rights, its ambiguity has been manipulated by the government to dismiss certain customary claims to control valuable resources, involving social and environmental violence (Harwell 2000). In addition, the (presumed) *adat* tenure system codified in the Agrarian Law ‘was contradictory to most *adat* practices’ and its enforcement began only 39 years later in 1999 (Moniaga 2007 in Singer 2009).

The Basic Forestry Law of 1967 placed all presumed forestry land (approximately 75% of all land) under the planning and regulation of the state through the Directorate General of Forestry; officially revoking customary rights. This created the National Forest Estate, dividing the forested land into conservation, protection and production forest; and resulting in a dual system of land administration under the authority of the Ministry of Forestry on one hand, and the National Land Agency on the other. Customary laws were further undermined in the following decades as industrial exploitation and development projects were promoted at the expense of local forest use. This was enforced by military power (Singer 2009).

Many areas considered to be State forest and free of any claim are actually informally inhabited, cultivated and managed by local people who have no tenure security (Fay *et al.* 2000; Contreras-Hermosilla and Fay 2005).

Successive regimes have reinforced state power by promoting an image of forest dwellers as trespassers destroying national resources. Transmigration programmes further added to the problems by relocating displaced people to lands that natives considered to be theirs.

Lands not classified as National Forest Estate are administered by the National Land Agency; however, this does not guarantee tenure security. Article 19 of the Basic Forestry Law states: 'Rights over land can be revoked, while giving adequate compensation based on procedures regulated by laws, in the public interest including the interests of the State and the interests of the Nation.' Subsequent regulations have sought to clarify and restrict the circumstances under which the state can take control of land. However, the systematic subordination of any land rights to higher concerns of public interest is a factor that seriously undermines the *de jure* tenure security of land rights holders in Indonesia (Colchester *et al.* 2006, p. 56).

Following the Asian economic crisis of 1997 and the fall of Suharto's regime in 1998, power moved from the weakened central state to local governments. Laws 22 and 25 granted regional autonomy to municipalities, giving them control over resource management, including issuing logging permits (Moeliono *et al.* 2009, p. 15). This period also saw a rise in illegal logging. Despite the introduction of several subsequent regulations that aimed to recentralise forest management, the current situation is characterised by confusion and incoherence over who has authority.

In 1999, Articles 3 and 5 of the Basic Agrarian Law were finally translated into operational measures with the *Adat* Land Registration Policy and regulation No. 5/1999 issued by the National Land Agency. In addition, a regulation issued in 2001 made *adat* rights formally recognisable and registrable, but under the discretion of the district head (Moeliono *et al.* 2009, p. 17). Yet by 2009, only four *adat* institutions (the Kampar, Baduy, Lun Dayeh and West Sumatran *adat* communities) had been officially recognised and registered. Under

regulation No. 5/1999, customary or *ulayat* rights can only be registered if there is a regulation from the district government recognising the existence of the corresponding *adat* communities according to certain criteria described in the law. Moreover, customary rights cannot be recognised on lands where the government has granted business utilisation permits (*Hak Guna Usaha* or *HGU*) to a third party (Colchester *et al.* 2006, p. 51; Sirait 2009, p. 21).

For the Forest Estate, the legal recognition of customary rights was almost impossible in the outer islands because too many actors in the administration (local and national) 'refused to recognise the existence of *adat* populations in particular' (Singer 2009). It was only in 2007 with Government Regulation 6 that the State really opened up possibilities for the recognition of local communities' traditional rights to the forest by creating new types of community forestry allowing them to undertake logging activities with a lighter procedural burden. However, legally recognised community forestry is still poorly developed (Singer 2009).

The problem of legal recognition of customary and informal land rights has yet to be solved. The regulation framing decentralisation formally recognised customary rights under certain conditions but gave district governments much flexibility in the recognition process. In fact, formal recognition of customary land rights seems to lack the political will needed to be enforced systematically and translated on the ground.

### 3.1.3 The study area: Kapuas Hulu district

The empirical study was conducted in Kapuas Hulu district, located at the eastern edge of West Kalimantan on the island of Borneo.

#### Biophysical context

The floodplain of Indonesia's longest river, the Kapuas, constitutes the lowest part of the region and is overhung by low mountains at its northern and eastern edges (up to 1767 m). The Kapuas floodplain constitutes Southeast Asia's largest wetland, comprising seasonal lakes, freshwater swamp forests and peat swamp forests. The upper areas are covered with hill *dipterocarp* forests, sub-montane and montane forests. The majority of this area is protected under the status of Danau Sentarum National Park (DSNP).

Seasonal lakes are under monsoonal influence; consequently, water levels show annual variation, rising to 12 m in the rainy season. DSNP regulates flooding by functioning as a buffer zone, retaining water in the rainy season and releasing it to the Kapuas river in the dry season (Onrizal *et al.*, 2005).

### Demographic context

Kapuas Hulu district is a rural, sparsely populated and little developed area. In 2005, the population of Kapuas Hulu was 204 000, with 94% living in rural areas, and an average population density of 7 persons/km<sup>2</sup> (the average density in Kalimantan is 28 persons/km<sup>2</sup> and 128 persons/km<sup>2</sup> for Indonesia as a whole).

While the human development index in Kapuas Hulu is approximately average for Indonesia (68.2 compared to 69.6 for Indonesia), the poverty index is 47.5 in this district, the highest in West Kalimantan province and very high in comparison to the national level (22.7 in 2002) (Central Statistics Agency 2009).

People living near or in forested areas are mostly Dayak and Malay ethnic groups. Living in the upper lands, the Dayaks are mainly shifting cultivators of rice and other crops, whereas the Malays live around the lakes and rivers in the lower part of the region. Fishing is the Malays' major livelihood. They also collect wild honey and wax to sell, and harvest timber and rattan for local use. They also utilise other forest wood products.

In addition to practicing swidden agriculture, the Dayak people also hunt and gather forest products. They enrich forest patches by growing fruit trees, rubber or other trees. Many of the young people leave their villages to work in Sarawak in Malaysian palm oil plantations or timber industries (Giesen and Aglionby 2000). The majority of Dayak people in Kapuas Hulu district are Iban Dayak.

Some parts of the Kapuas Hulu forests have been exploited by private or state companies in concessions allocated by the State during Suharto's regime. This has resulted in previously logged areas being converted into oil palm plantations (Jeans 1997), although this is not widespread in Kapuas Hulu district (Wadley and Eilenberg 2006).

Due to the frontier nature of Kapuas Hulu district, illegal logging activities, mostly led by Malaysian investors and involving local Dayak and Malay

communities, increased following the fall of Suharto (Wadley 2006).

### Ethnographic context: Iban communities

The empirical study was performed with Iban Dayak communities because they are the biggest ethnic group whose livelihoods directly depend on forest and land in Kapuas Hulu. Most information on the Iban people comes from ethnographic studies conducted in the Sarawak region of Malaysia.

Iban's livelihoods are largely dependent on natural resources based on slash and burn rice cultivation (*berladang*). They produce or collect the majority of their food. Along with rice, they plant vegetables as well as fruit trees, which distinguishes them from the Malay who mainly use the forest for wood and rattan. Iban people practice a complex agroforestry and forest management system. They identify several types of forests (seven types in the community studied by Colfer *et al.*, 2000). Iban divide old growth forest into unfarmed (climax) forest (*kampong*); old longhouse/settlement sites (*tembawai*); old tree reserves (*pulau*), which are specially preserved stands of trees; and old forest cemeteries (*pendam* or *rarong*), some of which date back over 100 years (Wadley *et al.* 1997). The *tembawai*, *pendam* and some *pulau* are considered sacred and protected from felling by Ibans. *Tembawai* have many fruit trees, and sometimes rubber trees, that were planted during the occupation of the area by the ancestors (Wadley 1997, Wadley and Colfer 2004).

Most cash income is generated from wage migration to Sarawak, Malaysia, where the Iban have strong cultural and social ties. This circular and regular labour migration is performed by men who seek the higher wages offered there in logging activities, construction and plantations. Other cash income sources are rubber tapping and pepper cultivation (Wadley 1997).

Iban communities are traditionally organised in 'longhouses', however, the social unit is the household, each household living in a private apartment (*bilik*). Each *bilik* is autonomous, but can call on the help of the rest of the longhouse if needed. Iban longhouses can contain from 5 to 50 *bilik*. Traditionally, each longhouse designates a head man, usually chosen through achievement rather than being an inherited title; however, the longhouse members are guided by a set of shared

rules (that can be called the *adat* institution) rather than by the personal authority of the head man. The longhouse members gather to take decisions about the organisation of ritual events, activities related to community infrastructure (such as paths and waterways), sites that are to be cleared for agricultural activities and government development projects and also to solve conflicts under the mediation of the head man and other elders. Decisions are taken by seeking a consensus between the different representatives of the households and are guided by the principles of *adat* (Wadley 1997). When conflicts cannot be solved by consensus among the members of a longhouse, they are handled through a customary dispute resolution system, recognised by the State (see Yasmi *et al.* 2007).

The traditional organisation of Iban societies has been modified by Indonesian national regulations. In 1979, the Village Law was introduced giving each longhouse the status of *dusun* (or ‘hamlet’), and grouping *dusun* into larger administrative organisations, the *desa* (or ‘village’). Each *dusun* has an elected *kepala dusun* (hamlet head), and each *desa* elects a *kepala desa* (village head) who is higher than the *kepala dusun*. Several *desa* are clustered to form a sub-district (*kecamatan*) administered by a *camat* appointed by the government of the district (Harwell 2010).

According to Wadley and Eilenberg (2005), the *desa–dusun* organisation created confusion because it amalgamated the management of different longhouses, losing the traditional autonomy of each. This created difficulty in building a consensus among longhouses.

**Oil palm plantations**

Since 2007, oil palm plantations have been developed in Kapuas Hulu following the issuance of approximately 20 permits to private companies by the district government (for a total area of 259 500 to 366 823 ha on land classified as APL, or *Areal Penggunaan Lain*, that is lands not included in the National Forest Estate) (Yuliani *et al.* unpublished). Figure 3 shows that some permits have been issued for forest lands.

**3.2 Problematic and methodological choices**

How does the large-scale transfer of use rights of land from local communities to a private company affect and challenge the land rights security and forest resource access security of local people? This paper aims to contribute to research on the factors driving land tenure security in forest dwelling or forest adjacent communities.

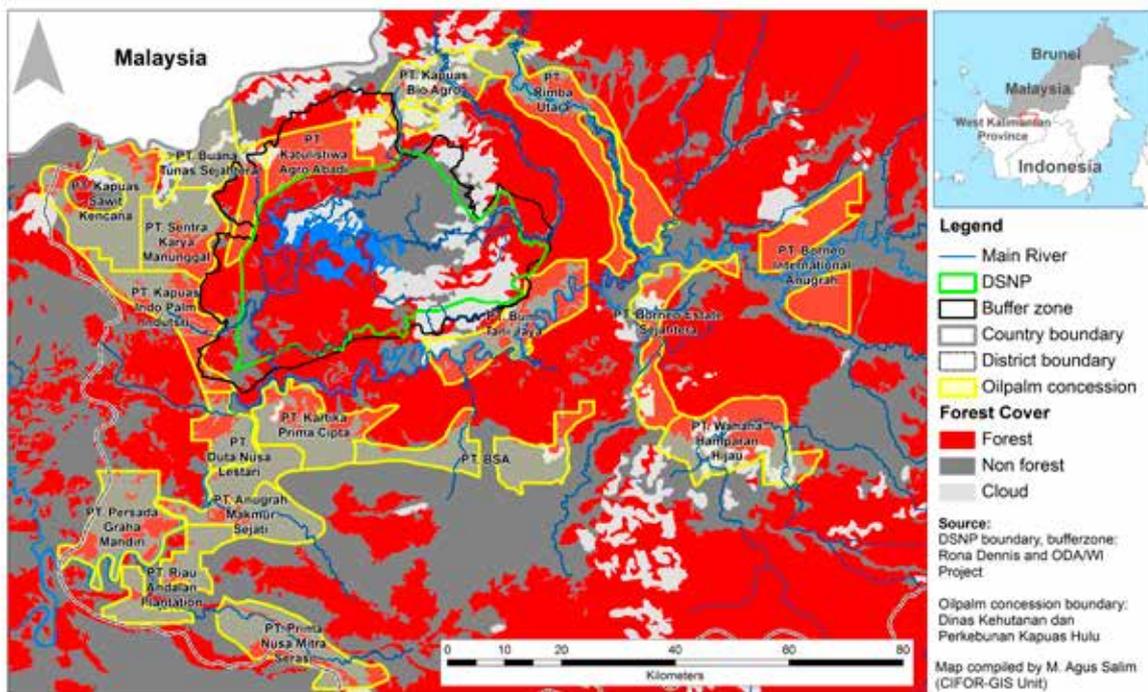


Figure 4. Map of oil palm concessions, protected areas and forest in Kapuas Hulu

In many areas, land is *de facto* controlled and used by local people, even though in several cases, it is *de jure* controlled by other entity, such as the government. Although *de jure* property rights should not to be ignored because they can have a strong influence on *de facto* property rights, *de facto* rights are a principal factor shaping the way people use natural resources. When a government grants *de jure* rights to a company, it implies a confrontation between these *de jure* rights and the *de facto* rights other actors exercise on the same land.

Over the last decade, oil palm plantations have spread rapidly across Indonesia, involving radical ecological and land use changes. In many cases, these are implemented by private companies under a government issued permit. The establishment of such plantations is then supposed to have a strong impact on the availability of land and forest resources for forest adjacent and forest dependent communities affecting their *de facto* rights and access to natural resources. At the same time, new resources, especially income opportunities are also generated.

This paper focuses on three main questions: How does the establishment of oil palm plantations change the access and rights of local villagers to forest resources and land and to new resources? To what extent do local people control this change? What power configuration inside the communities allows this change?

To estimate tenure security, it is assumed that:

- intra-community land right security is strongly correlated with the position of each right holder in the local constellation of powers;
- agreement (to the right transfer to the oil palm company) of the people that exercised rights on the land granted is a necessary condition for their rights to be secure;
- maintenance of their access to the stream of benefits related to the land that has been transferred is also a necessary condition for tenure security, as well as an indicator of their ability to defend their right during the land transfer process.

If villagers agree and control to a large extent the reallocation of property rights to the company and the related conditionality, then their *de facto* tenure security is rather high, whereas when this is imposed by others, then their *de facto* tenure security is rather low.

In the same way, if the access of villagers to the stream of benefits derived from the land that has been planted is maintained or replaced by other benefits they perceive as equivalent or higher, we can consider that their rights have been respected. However, when they lose benefits from natural resources, without being compensated at a level they judge equivalent to the loss, their rights have not been fully respected.

Finally, any potential threat to villagers' land rights should be identified when it can affect their assurance of not losing their rights in the future.

The following results are predicted:

- Iban people are dependent on forest for their basic needs (food, fuelwood and construction material);
- Forest in Iban villages in a common-pool resource;
- By reducing the forest cover, oil palm plantations are likely to reduce access to forest resources;
- Oil palm plantations are established by private companies who acquired land use and management rights from local institutions, thus modifying the set of rights villagers have to the land that is developed;
- The local communities are heterogeneous, with some individuals having more power and influence than others on land-related decisions, especially those related to oil palm plantations;
- Access to the decision process and benefits generated by the oil palm plantation depends on the assets of individuals, such as social position, gender, education and wealth;
- Access to these benefits and the degree of control individuals have in the decision process impact on their tenure security, and the way they perceive it;
- Villagers act as economically rational individuals, so those who think the benefits they can have from the oil palm plantation are higher than the benefit they gained from the former land use will be proponents of the oil palm plantation and those who think they will lose will oppose the plantation.

### 3.3 Methodology

#### 3.3.1 Study location

Four villages were selected in Kapuas Hulu district, West Kalimantan: Janting, a large village of 58 houses; Piyam, a medium village of 20 houses;

Sungai Telian, 29 houses; and Kekurak, 65 houses. These villages are almost exclusively inhabited by Iban Dayak people. Oil palm plantations are a new but rapidly growing development in the area and the villages studied are among the first to experience the impact of this change in land use. Figure 4 indicates the relative location of these villages and the area granted to the oil palm company.

The selection of Iban communities as representing those most dependent on forest resources restricted the possible area of study to the northern half of Kapuas Hulu. Villages that had recent experience of oil palm plantations being developed on part of their customary territory were chosen for study. The areas converted were 2400 ha of 4000–5000 ha in Kekurak; 2640 ha of 4640 ha in Piyam; and 462 ha of 4000–5000 ha in Sungai Telian. The figures for Janting are not known. The oldest palms were planted in Kekurak in the second half of 2008, with the youngest planted early in 2010 in Piyam and Sungai Telian.

Of the villages, Janting is the only one that has not allowed oil palm plantation development and has a

poor relationship with the oil palm company (Yayan Indriatmoko, personal communication). The other villages had a positive relationship with the company.

### 3.3.2 Data collection

Data collection was based on semi-structured interviews with ‘key informants’ from the villages and randomly selected family heads. The wives of the family heads (or another elder female member of the household) were interviewed separately, when possible. In each village, we tried to interview the *kepala desa*, *kepala dusun* and *patih* (governor of several longhouses) as they are the main local leaders. In Piyam, it was impossible to interview the *kepala desa* and the *patih*, in Kekurak, the *kepala desa* could not be interviewed. The same themes were discussed with all key informants, except those concerning personal livelihoods and assets.

Each village was visited for 10–15 days allowing approximately 20 people to be interviewed from each site. To improve the coherence of data collection a fixed percentage of each village was interviewed: 30% in the larger villages of Janting and Kekurak, and

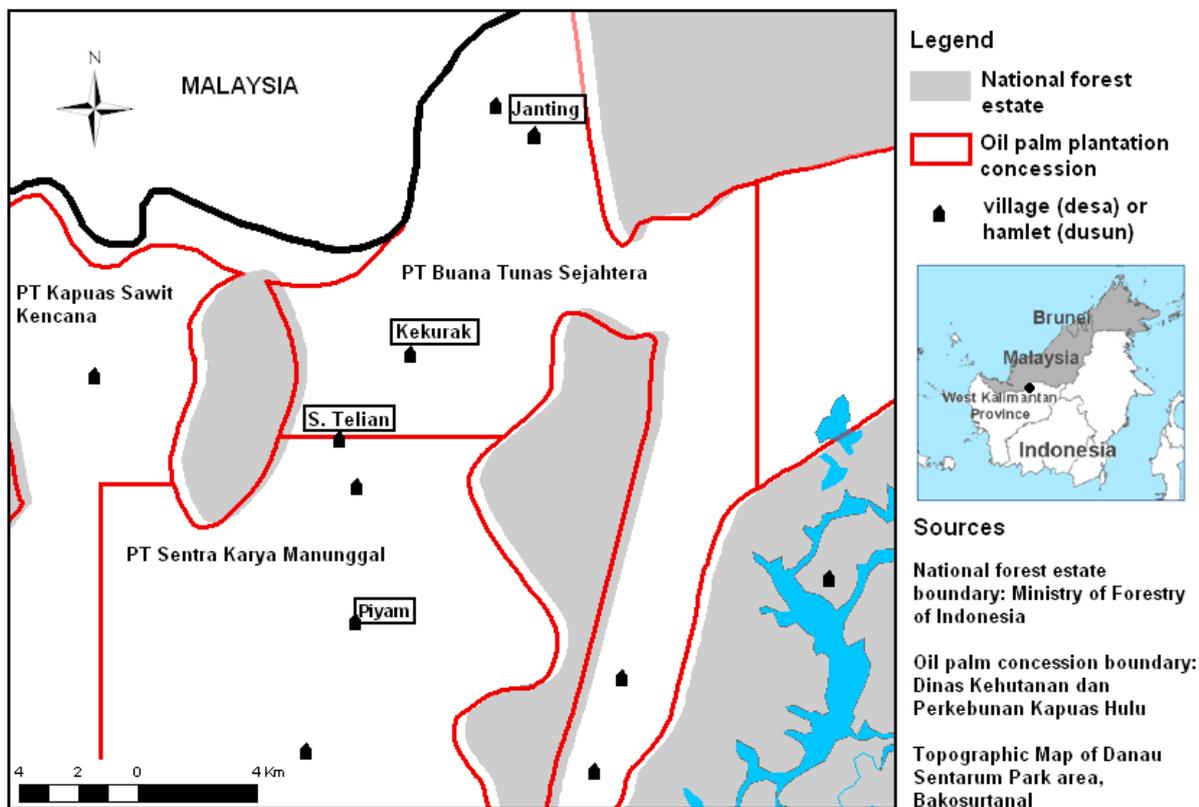


Figure 5. Location of study site showing oil palm concession area

60% in Piyam and Sungai Telian. This was limited due to time constraints.

Informants were selected randomly from a list and interviewed alone, when possible, in their homes. They were informed that the interviews were anonymous and no information would be divulged to other members of the village. Permission was obtained to record the interviews.

Following Le Meur (2002) and Quivy and Van Campenhoudt (1988), the aim was to conduct interviews in a flexible and open way so that unpredicted and unexpected ideas, hypotheses and study domains could emerge. However, this proved difficult and most interviews were structured. Interviews with key informants and the family heads, tended to be more open and spontaneous.

Finally, observations concerning informal discussions, remarkable events such as conflicts, people's attitudes and relationships were systematically compiled in a notebook and integrated into the research.

### 3.3.3 Data analysis

To analyse the data collected in the field, impressions were recorded immediately after the end of the fieldwork. The ideas developed by the different respondents were compared and the reliability of the information was assessed using the triangulation method.

In addition, the answers given by each family head and their wife were compiled and coded in a table to explore the data quantitatively and try to find potential correlations between variables. As many variables were nominal data, chi-square tests of independence or Fisher's two-sided exact test (if a low number of observations restricted the use of a chi-square test) were used to confirm observed correlations.

These quantitative correlations and trends together with the outcome of the qualitative analysis enabled interpretation and enrichment of the quantitative observations with the outcome of the analysis. The validity of the conclusions was assessed by reference to published data. The conceptual framework guided the exploration of different correlations and helped to structure the whole analysis.

In the next section, the main results are presented in the context of the institutional analysis and development framework applied to tenure security.

## 3.4 Results

### 3.4.1 Local social and institutional context

#### Crops and agriculture

The main activity of 89% of the respondents is swidden agriculture, based on *ladang* (rice cultivation) with a fallow period of about 10 years. Some vegetables are also planted. After the rice harvest, cassava is generally planted; the leaves are used for human consumption, and the roots mostly to feed pigs. The majority of the rice harvest is consumed, although surplus vegetables and, less frequently, rice are occasionally sold within the village.

Most meat is purchased. All villagers grow poultry and pigs, but these are only occasionally consumed, and reserved for special events and rituals.

#### Forest use

The intensity of forest use and the related dependency on forest products varied greatly from one individual to another, with few individuals collecting forest products every day.

Some vegetables, such as *pakis* (bracken) or *rebung* (bamboo shoots), and other products, such as snails and various leaves, are commonly collected in the forest and eaten or sometimes sold. These activities are generally performed by the women, although men sometimes collect such products. Wild boar and deer are hunted, mainly by men, although the frequency of this varies greatly (from once a year to several times a week). The meat is usually shared with friends and family and consumed, but surplus meat is sold to other village members if the hunt is particularly successful. Meat is supplemented with fish, but not enough are caught to allow any to be sold.

Most fruits, such as banana, mango, jackfruit and pineapple, are collected from young trees that villagers plant near their homes and in *tembawai*, where fruit trees such as durian, jackfruit and rambutan are grown. In two villages, Sungai Telian and Kekurak, durian fruit production is very high

and people can earn as much as IDR 1 million each week of the season, which lasts throughout December, by selling durian in the nearest town. These agroforests constitute real forest ecosystems.

Many people have young rubber tree plantations that are not yet productive and some have inherited older rubber trees which they will harvest until the trees die. In one day, one person can harvest 5–15 kg, which can be sold at an average price of IDR 9000.

Most households use gas to cook vegetables and firewood to cook water and rice. Fuelwood is collected from the forest, but also from old rubber plantations and fallow lands.

Most houses (81%) are made with timber extracted from the village forests, frequently obtained during illegal logging activities, which affected the four villages from 2000 until 2005–06, although some houses are made of concrete and timber. Most harvested timber is used by the village.

Forests also provide the material (rattan, *tikar* (mats), leaves, tree bark, bamboo, etc.) for many every day objects, such as *ladong* (backpacks), baskets, hats, *tikar* and *bubu* (fish traps). Forest products, such as rattan, are occasionally sold, as well as the objects made of them.

In the past, illegal logging involving operators from Malaysia represented an important source of income for villagers, who would receive commissions and could work as tree cutters, truck drivers, cooks, cutters and carpenters. Although illegal from the perspective of central government, the people welcomed these activities, because, in contrast to earlier logging operations (in the time of Suharto), the companies would work in consultation with the villagers and redistribute some of the benefits to them (see Wadley and Eilenberg 2005).

### Wage labour

Temporary and circular migration of males to Malaysia and Brunei in search of wage labour, as well as illegal logging activities, were previously common sources of income for the village. However, strict regulation now prevents this.

Many people work in oil palm plantations as day labourers (the position with the lowest wage). As shown in Figure 6, more women than men work in the plantations (in the tree nursery or, watering and spraying herbicides and fertilisers). The Fisher

exact test confirms this trend with  $p < 0.005$ ,<sup>1</sup> which shows a link between the type of work and the gender of the respondent. In fact, men have access to more work opportunities that women and prefer jobs that are better paid (villagers often complained that they were paid too little for the hard work they do as labourers). Some villagers – mostly men – were working as foremen supervising labourers or heavy equipment, or as drivers or security guards, with one working with the company facilitating villagers. Some men also worked as carpenters during the building of the company staff houses. Two women in Sungai Telian were working as supervisors.

### 3.4.2 Land tenure

In all villages, the local land tenure system is a mix of private and common property. Forest is commonly held by all members of the village, but villagers may own fields and fallow lands privately.

#### Privately owned fields and fallow lands

All *ladang* are established by clearing privately owned fallow lands (*damun*). Most *damun* are inherited, and the private property right was acquired by ancestors by clearing forest. In some cases, *damun* are commonly held by sisters and brothers. If a village member moves away from the village to another place, she or he loses their plots of land, although they retain a special use right. One of the respondents in Janting explained it in these terms:

I received many pieces of land from my grandparents, but they're useless, so I want to clear them for oil palm plantation.

Did your siblings also receive land?

Our custom here for Iban people is that when they marry and move to another place, to the place of their spouse, they get rights there, and lose their right to own land here. But if I clear my land for oil palm, I will give them a share, not completely, but a part, because it's us who stayed in the village, who retain ownership from beginning to end.

(Respondent J03)

<sup>1</sup> In the calculation of the Fisher exact test, we only distinguished between the people working as labourers and those having over kinds of work in the oil palm plantation.

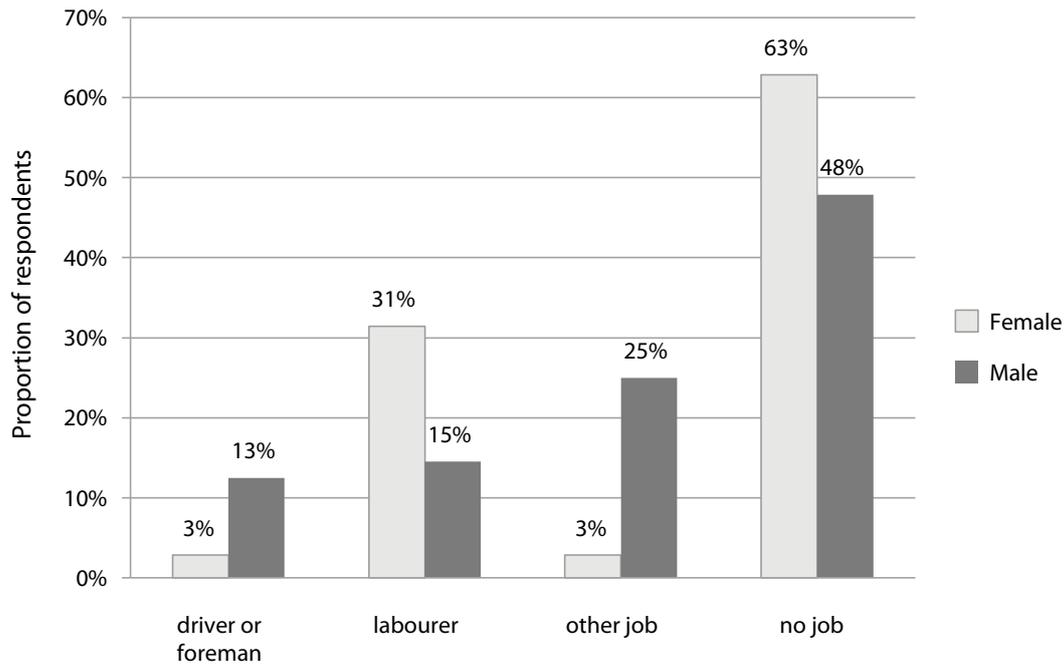


Figure 6. Gender and work opportunities (proportion of respondents working outside of the village)

### ***Tembawai*: common agroforest and inheritance from ancestors**

*Tembawai* is a fruit tree agroforest, which is owned by all villagers. They are free to collect fruit, but felling these trees is strictly forbidden.

Exceptionally, trees that are no longer productive may be felled if a villager needs timber for their own use. In the case of durian, perhaps because of its high economic value, in Sungai Telian and Kekurak, the trees are guarded and harvested by groups of villagers. After sorting the fruits according to their quality, the yield is then divided per family head. For all the other fruits, each member of the village picks them as needed.

Some trees in the *tembawai* are still considered to be privately owned by the descendants of the people who planted them, and it is hard to understand why these trees would have such a different status.

### **Other planted trees as private property**

When a tree has been planted near the current settlement by somebody who is still alive, it is privately owned, which means that permission to collect its fruit must be obtained from that individual. However, if the tree is planted on land that is privately owned by somebody else, the owner of the land has use rights on the tree, which means he can collect its fruit, but this situation seems very rare.

### ***Pulau* and the associated use rights**

Uncleared forest land that is not privately owned is called *pulau*. Different kinds of *pulau* are governed by different rules according to the kind and to the village.

In all villages, there are *pendam* or cemeteries, which are sacred and associated with a set of rules, the most important being that tree felling is forbidden. However, collecting non-timber products from these places is allowed.

Generally, timber can be collected, as long as it is for personal use or sold to other members of the village and that only the timber needed is collected. Except in Piyam, authorisation is given by the village head and the *patih*, or a consensus has to be reached with the other family heads. In Piyam people seem free to collect timber in the forest without asking permission, except for a certain part where the timber is 'kept for the grandchildren'. In some villages (Piyam and Sungai Telian), some *pulau* have been specially protected from the previous illegal logging in order to ensure the villagers still have a stock of timber for their own needs. People are not allowed to collect timber from this type of forest in Piyam.

Other forest products, such as ferns, bamboo, material to make *tikar*, etc., can be collected freely by the village members, without asking permission,

provided they are inside village territory. These products can also be sold. However, outsiders have to report to the village head. Some informants reported that outsiders were free to collect these things. They may not be allowed to collect them directly, but as compliance to the rule is difficult to control, they may actually collect them freely.

### The special status of firewood

Firewood can be collected by villagers from anywhere, as long as no big tree (a potential source of timber) or rubber tree is felled. If someone wants to collect firewood from another person's rubber tree, permission must be sought from the owner. Firewood can be freely collected on fallow land probably because it helps to clear it.

### 'Empty lands'

These lands have no owner, and have no protected status. Their low fertility makes them unsuitable for cultivation. Some of them are forested; others are regularly burnt because of their proximity to *ladang*. As these lands have no owner and are not considered productive, they are not protected from fire.

### Outsiders and *pulau*

Outsiders (people not from the village) have no right to collect timber from *pulau*. To do so, they must ask permission and pay.

In Janting, there was a case of a man who felled trees in the forest without the villagers' permission. The village head and some other villagers found him and confiscated his chainsaw (which was placed in the house of the *patih*). The man had to pay a fine to get his chainsaw back. In Sungai Telian, three people from the Pontianak area were caught extracting rocks from the river inside the village territory. They had to pay IDR 5000 for each sack of rocks they sold.

Rules on hunting differ from one village to another. In Janting, for example, outsiders are allowed to hunt as long as they do it with villagers. In Sungai Telian, outsiders are allowed to hunt, even alone. However, several people complained that game was becoming rare, and the *patih* said they were thinking of creating a new rule prohibiting outsiders to hunt in the village territory.

### 3.4.3 Modification of land use

In addition to being planted in Janting, oil palm has already been planted on some forest land around the other villages. Most land converted to oil palm was previously fallow land.

In Kekurak and Piyam, however, because of the size of the plantation and the low population density (more than 2000 ha for 20 and 65 houses, respectively), some of these fallow lands were probably disused and already reverting to secondary forest.

The 'empty lands' located between two plots given away to the company have also been converted. In the three villages, it appeared that lands designated as forest or *pulau* had been cleared to plant oil palm. It is important to keep in mind that the entire region underwent significant logging activities from Suharto's regime until as recently as 2006. Questioning local people on these activities, it appears that most forests, even *pulau* were logged in the past, although they were not cleared. So, it is very likely that even before the oil palm plantation, very few 'natural', primary forests remained.

However, in each of these villages, local people have intentionally protected some forests from land use conversion. These are cemetery forests for cultural reasons, *tembawai*, also for cultural reasons and for the fruits they provide, and other *pulau*, in some cases, because of the timber stock they represent for the villagers and for their descendants. In the mountainous areas of Kekurak and Sungai Telian, forest was preserved because the river providing the main source of fresh water originated there and it was feared clearing the land would make the water dirty. In Piyam, people insisted that forest lands with big trees (*kayu besar*) should be 'kept for the grandchildren later'.

To conclude, some oil palm plantation has been established on degraded forested lands, but not all such lands have been converted, local people protect some for cultural reasons and because they consider them useful. The oil palm plantations company seeks to have its plantation certified by the Roundtable on Sustainable Palm Oil (RSPO), which imposes standards prohibiting companies from planting on peat lands and 'high conservation value' forests. However, only a comparison of aerial photographs taken before and after the establishment of the oil palm plantation would enable a precise assessment of the resulting loss of forest.

## 3.5 Which institutions, which actors?

This section defines the actors and institutions shaping villagers' land tenure security.

### 3.5.1 Institutions and rules

#### The different authorities

Three main authorities can be distinguished concerning land rights and land management: the national government, the local (district) government and the local customary authorities. In each village studied, those governing land rights were the *kepala desa*, *kepala dusun* and *patih*. Although *kepala desa* and *kepala dusun* were introduced through a regulation issued under Suharto's New Order government, the *patih*'s status was established much earlier. The villagers perceived both authorities as *adat*, i.e. customary authorities and no conflicts between them were observed. All three can impose fines for violating rules, which creates an incentive for individuals to comply.

We can also distinguish international institutions advocating the company as being socially and environmentally responsible. This is reflected by the fact that the oil palm plantation claimed to be certified by RSPO. Here, the incentive is economic and market-driven, and increasingly companies have to invest in their image. Several criteria developed by the RSPO certification scheme aim to guarantee respect for local communities' land rights (see Annex 1).

#### The customary tenure and conflict resolution practices

The rights that are *de facto* exercised by villagers are sanctioned by customary institutions. The *patih* (sometimes with the help of the *kepala desa* or *kepala dusun*) is responsible for arbitrating land conflicts and disputes, according to *adat* principles and can call for other *patih* or the *temunggung* to help if necessary; as a last resort disputes are settled with cock fights. A conflict is considered solved when both sides accept the arbitration of the *adat* authority (*patih* and *temunggung*). This is how the *kepala desa* of Janting (J18) explains it:

To make a decision, we see, we try to understand what the problem is between both parties. When it's a problem about boundary, for example boundaries that are not complete, we can help them to complete them. So we ask them if they want their dispute to be solved like this, we ask them whether they want to or not. If they want it to be regulated by the *patih*, or *kepala dusun* or *kepala desa*, OK, we are done. When

two people claim to have the same land, then, we try to find witnesses who can tell us who the real owner is. When we agree on one decision with the people who know at the origin, we can also solve it. But if the people that are having a dispute don't accept our decision, or if one of them doesn't accept losing, then, we organise a cock fight, it has been like that since the time of my grandmother, it's the custom.

According to the low level of intra-village land conflicts (7% of those interviewed were in conflict with someone else at the time of the interview and 13% had experienced problems before), this dispute resolution mechanism appears to be rather efficient. In addition, the proximity of the *patih* makes it affordable.

#### Degree and affordability of recognition of customary rights

The institutional context is characterised by the coexistence of different institutions concerned with land rights, mainly national and local government regulations and local informal practices. The official regulations concerning land rights have already been discussed.

Customary land rights in Indonesia have been limited by laws permitting the State to invoke the 'national interest', a poorly defined term, to gain control over customary lands. The current legislation leaves recognition of customary institutions to the discretion of the district government. In Kapuas Hulu district, customary laws are recognised by the local government through the recognition of the authority of the *adat* leaders, the *patih* and the *temunggung*. However, customary land rights in themselves are not explicitly recognised in any district in West Kalimantan (Sirait 2009).

A higher degree of legal and official recognition of property rights is guaranteed by registration with the National Land Agency and through the related land certificate (*sertifikat*), generally for private property rights. According to key informants, few villagers have any *sertifikat*, which can be explained by the high costs associated with obtaining one (a *sertifikat* costs IDR 5 million/plot and must be obtained from Putussibau, a day's travel away). Another document, with a lower degree of legal recognition, can be issued at the level of the *camat* for IDR 200 thousand, but this is still considered unaffordable.

### Clarity of the rules

In addition to confusion surrounding national regulations, unclear customary rules can be a factor threatening the tenure security of the villages.

In Janting previous disputes reported between villages indicate that the absence of clearly defined village boundaries can lead to inter-village conflicts. In fact, the boundaries of the villages have never been officially registered, mapped and demarcated.

Janting is the only village that rejected the oil palm company. However, a plantation was established on part of the territory claimed by Janting, but which the neighbouring village (Semuntik) considered theirs. Janting was the first village to be established and the primary forest was cleared by the village's founders, establishing a complete ownership right to the cleared area for themselves and their descendants (Janting's current inhabitants). Semuntik was founded later and the area that they ceded to the oil palm company had only been lent to them by Janting. The conflict could not be resolved because of coexisting traditional and official dispute resolution institutions, neither of which are dominant. Janting wanted to resolve the conflict in the traditional way, but Semuntik, backed by the oil palm company, refused and proposed instead to go to court, which Janting rejected because of the cost involved:

So why do you have a problem with Semuntik? We don't want it, we reject the oil palm plantation, but it's them who accepted it, who allowed the company to use our lands. We discovered it, and we invited them to discuss it. They didn't want to. The only thing they want is to meet in Putussibau in the court to discuss the issue of these lands. But we don't want that as it's too expensive! [...] Their lands are mixed with ours. There are some lands they own there, but from upstream to the road, all of it belongs to Janting. They use some of these lands, they are allowed to use our land, but we have 'pure' rights over them, I would dare to swear it, this is the pure right of the people of Janting, since my ancestors a long time ago. We also have *tembawai* there. But the people of Semuntik arrived around 50 years ago; long after the people of Janting had started from nothing. That's why they got our lands. (*kepala dusun* of Janting, J2)

During the illegal logging period, a lack of clarity in the delimitation of village territory triggered inter-village conflicts that were difficult to resolve.

However, the State and the army intervened as arbitration authorities and resolved the conflicts by physically delimiting the boundaries between villages where the conflicts were most serious.

### 3.5.2 Community attributes

#### Social norms

Social organisation in the four villages was strongly shaped by social norms promoting harmony and consensus, respect for local authority and others, property and a clear delimitation of the control of land according to gender.

In all villages, the respondents indicated that decisions about land at the village level were made by consensus, requiring all households to agree. At the same time, many individuals tended to join the position of the majority (46% of the respondents said they would follow the others when asked what their position on oil palm plantations was), which facilitates achieving a consensus.

As underlined by Sather (2006), equality is also present with hierarchy, individualism and competition in Iban societies. In fact, the village leaders (mostly *patih*, *kepala desa*, *kepala dusun*) were respected and their authority rarely challenged. This was even the case in Piyam, where several respondents complained that the *patih* was corrupt and misappropriated money for himself. Yet, apparently no action had been taken to address this. This may be due to the fact that the *patih* is appointed by the *adat* council at the level of the district and is not elected. In Piyam the former *kepala dusun* had also been accused of corruption, but then, the villagers elected another man in his place (P15 and P16 interviews).

In all villages, a common feature rapidly emerged: land is a male issue. When decisions about land have to be taken at the village or household level, they are taken by household heads who are mostly men: 85% of male respondents said they were the main decision maker on land issues in their household, compared to 31% of female respondents (two-sided Fisher test,  $p < 0.001$ ).

When a man cannot participate in a meeting, a woman replaces him; but she does not take an active role. Several women confessed that they were too shy (*malu*) to express their point of view during such meetings.

Who made the decision to accept the OPC here?  
 The village leaders...  
 We, the people, we don't know.  
 Don't you join meetings?  
 No, it's my son who does.  
 You're not invited...?  
 No, those who are called: the men, it's them who  
 participate in meetings, women, rarely do.  
 (Respondent K13)

The participation of women in the decision depends then on the repartition of powers inside each household. Although it is not always the case and it is difficult to investigate the real balance of power inside households, the answers given by most people suggest that it is the man who generally makes decisions concerning land, and more specifically the decision to hand over their plots to the oil palm company, even though the lands might originate from the woman's family. This means that in most cases, women have access and use rights to land, whereas men have management rights.

The exclusion of women from decision making was also reflected in the difficulty of interviewing them. Many were reluctant to be interviewed and said they would not know the answers to questions, and that their husband, son or father would be more able to answer; something the other persons present would immediately confirm. Yet, the women accepted this situation. This can probably be explained by the importance of local social norms in shaping people's own perception of their rights and place in the society.

### Distribution of assets

To assess the repartition of material assets, each interviewed household was graded to represent its apparent wealth compared to other households in the village. This was based on housing materials (floor, walls, roof), furniture present (TV, Hifi, DVD player, couch, etc.) and ownership of a vehicle. Although there were no extreme inequalities, there were some differences. Piyam, in particular, has the most clear-cut inequalities, with a majority of poor households, in contrast with Sungai Telian with a high proportion of rather rich households.

In Piyam, it is worth noting that the wealthiest households were those of the local elite (the *patih*, *kepala dusun*, former *kepala dusun*) and their close relatives (brothers). The villagers suggested that this wealth was acquired by corrupt practices.

The level of education is another asset that is unequally distributed, with a majority of individuals in Janting, Kekurak and Piyam having only attended primary school (60%, 75% and 55% of respondents, respectively) and a high proportion of people having no education at all (40%, 25% and 45% of respondents, respectively). Sungai Telian stands apart; it was the only village where some respondents had attended high school and university or vocational school (no school, 26%; primary, 39%; high school, 30%; higher education, 4%).

Land can also be an important asset, especially in the case of a land transfer. It influences the interest of an actor in oil palm plantations, and it can be expected that the villagers owning a lot of land will be more interested in engaging with the oil palm company. As indicated in Figure 7, people tend to have less land in Janting than in the other villages. In 1997, the Remote Sensing/GIS Unit of the Indonesia–United Kingdom tropical forest management programme produced an (unofficial) map representing the customary territory of the villages in and around DSNP. According to this map (see Annex 2), the territory of Janting is much smaller than those of the other villages. The relatively high number of inhabitants in Janting implies a consequently low area of land available to each.

### Past experiences

Three main elements of their past were often mentioned by the villagers: the illegal logging period, temporary migration to Sarawak and the repeated failed attempts to establish oil palm plantations.

While the region had already experienced concession logging under Suharto's regime, that mainly benefited local and national elites. The decentralisation of the end of the 1990s triggered an explosion in illegal logging. In Kapuas Hulu, timber was extracted and purchased by Malaysian investors with the participation of local communities. Central government put a stop to the logging activities in the region in 2005, greatly reducing the income of many people (Wadley and Eilenberg 2005, Eilenberg 2008). The villagers talk about the logging period as a happy time when it was easy to find money. As these activities were done with their approval and they received benefits from them, they considered them legitimate.

Some years ago, was there a company harvesting timber here?

Yes, there was an agreement with the community and sometimes they gave money to the village. Or the people of the village also worked independently and sold the timber to the boss of the company in 2002 and 2003.

How did you share the benefits with the company harvesting timber?

It was rather good, the people here could buy secondhand cars and build houses. Before that, the companies PT Rimba Ramin, Yamakir and Kapuas Indah operated here. They worked on our land, but only gave us cigarette money [*uang rokok* = tip]. It was not enough for the people living here [he was referring to the logging activities under Suharto's regime]. At that time we forbade them, but they didn't want to stop as they already had permission from the Ministry of Forestry; they had a letter. That was in the 80s. But during the illegal logging period, the community here was happy because we felt we were the ones benefiting from our own land. Yet according to State regulations it was illegal.

(J17)

The geographical and cultural proximity to the Sarawak region of Malaysia enabled many male Ibans to migrate there temporarily to find wage labour. There, it was easy for them to find jobs with a high wages by Indonesian standards. This migration was facilitated by the kinship linking many Indonesian and Malaysian Ibans (Wadley 1997). As a consequence, many villagers compare Indonesian and Malaysian Borneo, emphasising the marked differences in development. In Sarawak, palm oil plantations have been established for decades, and, based on this, the villagers tend to associate oil palm plantations with development. Seeing their Malaysian relatives having a higher living standard than them also increased their desire for development. The Malaysian State now requires those seeking work to have a valid passport, which is prohibitively expensive for many of the villagers, so many no longer travel to work, although some still continue to work illegally.

To sum up, the past experiences of the four villages were marked by the disappearance of significant economic opportunities due to the actions of the Indonesian and Malaysian States. When the oil palm company arrived, the villagers were experiencing a

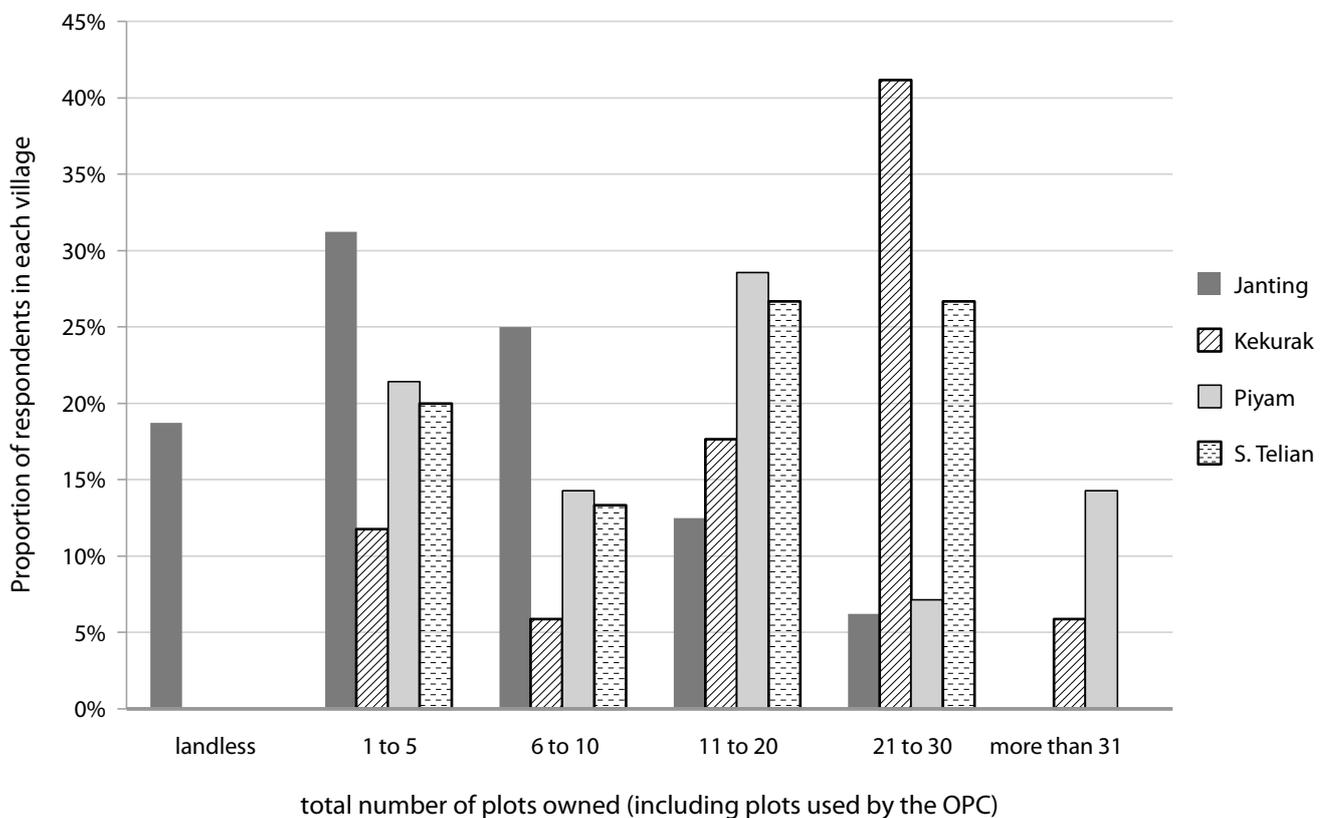


Figure 7. Number of plots owned by respondents in each village

difficult economic situation. The villagers had also experienced various attempts by the State to establish oil palm plantations. Although only Janting and Piyam were directly concerned, the story of these failures is well known and has been appropriated by the other villages.

### 3.5.3 Actors

#### Village and villagers

Each village can be considered as an actor in the sense that most villagers share a common purpose, have some common resources and take some decisions and actions as a group. The representatives of the villages (local elites) as well as many villagers expressed an interest in improving living conditions: as an actor, the purpose of the village is to develop.

The level of development is a component of the material assets of the village and is rather low. All villages are connected to the electricity network, but in Janting and Piyam, there is no running water. Most houses do not have toilet facilities. There is only one road that connects the area to the rest of Kapuas Hulu, and it is in poor condition. Apart from local elites, who receive relatively low wages from the State (except for the *kepala desa* and *kepala dusun*), very few individuals get regular wages for full-time jobs (only four respondents). The main resource action of the village is its control of a large territory.

The village is an actor in itself, but villagers as individuals or as a group of individuals sharing common characteristics are also actors interacting inside the community and also with external actors or 'outsiders'. In particular, the distribution of action resources, namely community assets (gender, status or function in the community, education, wealth, information) results in the appearance of different actors inside the village, with different degrees of control in the action arena.

#### The oil palm company

Although there are different branches of the oil palm company operating in each village, they all belong to the Indonesian Sinar Mas group, the biggest palm oil producer in Indonesia. As such, the company appears to be reliable and its reputation is one of its assets. In contrast to the other actors, the oil palm company has a key asset corresponding to its investment capacities and, in contrast to the villagers, it has wide access to knowledge and information through its skilled employees and its national scale.

As a private company, its basic interest is to make a profit. Sinar Mas is active in international markets and exports the majority of its products to developed countries. From an economic perspective, oil palm companies are in a very favourable position because of the increasing demand for edible oil and biofuels in international markets; this is a strong incentive for the company to establish large oil palm plantations. However, there is much controversy over the negative impacts of oil palm plantations on the environment and local communities, and companies are increasingly required by international institutions to account for their practices.

#### Local and central government

The main feature of government is its status of public authority allowing it to use coercive power to enforce national and local regulations.

The control of the borderland with Malaysia by the Indonesian government has always been a challenging necessity to ensure the security of the Indonesian boundaries. This is why, in this particularly strategic area, the government has a strong incentive to avoid conflicts with its remote citizens (Eilenberg 2008).

#### NGOs

Several NGOs are represented in Kapuas Hulu, and more broadly, many NGOs are involved in the issues of deforestation for oil palm plantations. However, few of them work in the study area, as their efforts have been focused on DSNP (Linda Yuliani and Yves Laumonier, personal communication). Riak Bumi is the main local NGO active in Kapuas Hulu (but it is based in Pontianak). International NGOs (WWF and Flora and Fauna International) are working in the eastern part of Kapuas Hulu. However, since the oil palm plantation was proposed, several NGOs have contacted the villages to warn them about the environmental impacts of oil palm plantations.

As actors, the main interest of the different environmental NGOs is to protect the environment and limit deforestation. In comparison to villagers, they benefit from wide access to information and knowledge, because of their larger geographical scope.

Their strategy is to raise public awareness on environmental issues. In the case of oil palm, it is particularly interesting to note that Sinar Mas is the target of an international campaign led by Greenpeace, denouncing the 'greenwashing' of its practices (with a case study in the Danau Sentarum area; Greenpeace 2009).

### 3.6 Patterns of interaction and tenure security

In the action arena, the interactions between the different actors produce several outcomes impacting the tenure security of the villagers. In this section, the environmental constraints and opportunities (linked to the biophysical environment, but also the institutional environment and the attributes of the community or village) and the attributes of each actor (resource action or asset, interest, strategy and action) combine to create several outcomes, or patterns of interaction indicating a certain degree of tenure security. Perceived tenure security is distinguished from measured tenure security, and the tenure security of the village as a community is distinguished from the intra-village tenure security, at the level of the villagers as individuals.

Four patterns of interaction have been identified as indicators of tenure security:

- the degree of conflict and cooperation between the different actors,
- the enforcement and compliance to the rules allocating rights,
- the distribution of rights that are exercised in practice, and
- the ability of the right holder to maintain and defend his or her rights.

#### 3.6.1 Conflicts and cooperation between the villages and other actors

##### Cooperation between villages and the oil palm company

The land that has been planted by the company was used and controlled by the local communities. The lack of strong recognition of their customary rights in official regulations could have made these communities vulnerable, allowing the company (backed by a plantation permit issued by national and local government) to take over their land. However, three of the villages (Piyam, Sungai Telian and Kekurak) had a good relationship with the company (Figure 8).

In fact, the oil palm company did ask the permission of the local people to use their land and tried to establish cooperative relationships.

From the company's point of view, local community approval is required for several reasons. First, the recent national regulation, despite its incoherence,

does recognise the importance of taking into account the well-being of local communities. For the local (and national) government, disregarding the claims of the local communities by sanctioning a forced transfer of land to the oil palm company would probably lead to conflicts endangering the security of the boundaries with Malaysia.

Second, the cost associated with the management of conflicts with local communities is prohibitive.

Finally, the institutional environment of the company is characterised by strong pressure from the international community as well as from the market for corporate social responsibility. This is particularly important for the very controversial oil palm plantations. NGOs are key actors in the sense that they monitor the activities of the companies and denounce their negative impacts to the public. The alleged certification of the oil palm plantation by RSPO confirms the importance of an environmentally and socially responsible image for Sinar Mas.

What encourages the villages to cooperate with the oil palm company? The combination of a strong interest in development and the disappearance of former sources of income create a situation where oil palm plantations are seen as the only way for villagers to improve their life. The oil palm company is the first provider of wage labour in the area. Of the respondents, 73% described work opportunities as the main advantage of the oil palm plantation. In addition, in the villages that accepted the oil palm company, the costs associated with the transfer of part of their land to the company were not very high because of the large size of the village territory in comparison to their low population.

The strategy used by the oil palm company was probably a key element in convincing the villagers. During the *sosialisasi* (socialisation) phase and meetings with the village elite and villagers, company representatives emphasised the benefits for the community of the plantation and attempted to build trust by explaining their intentions and asking permission to use the land. Three kind of benefits were promised:

- jobs: local people would be employed in preference by the company, according to the skills required,
- benefit sharing: 20% for the local people and 80% for the company,

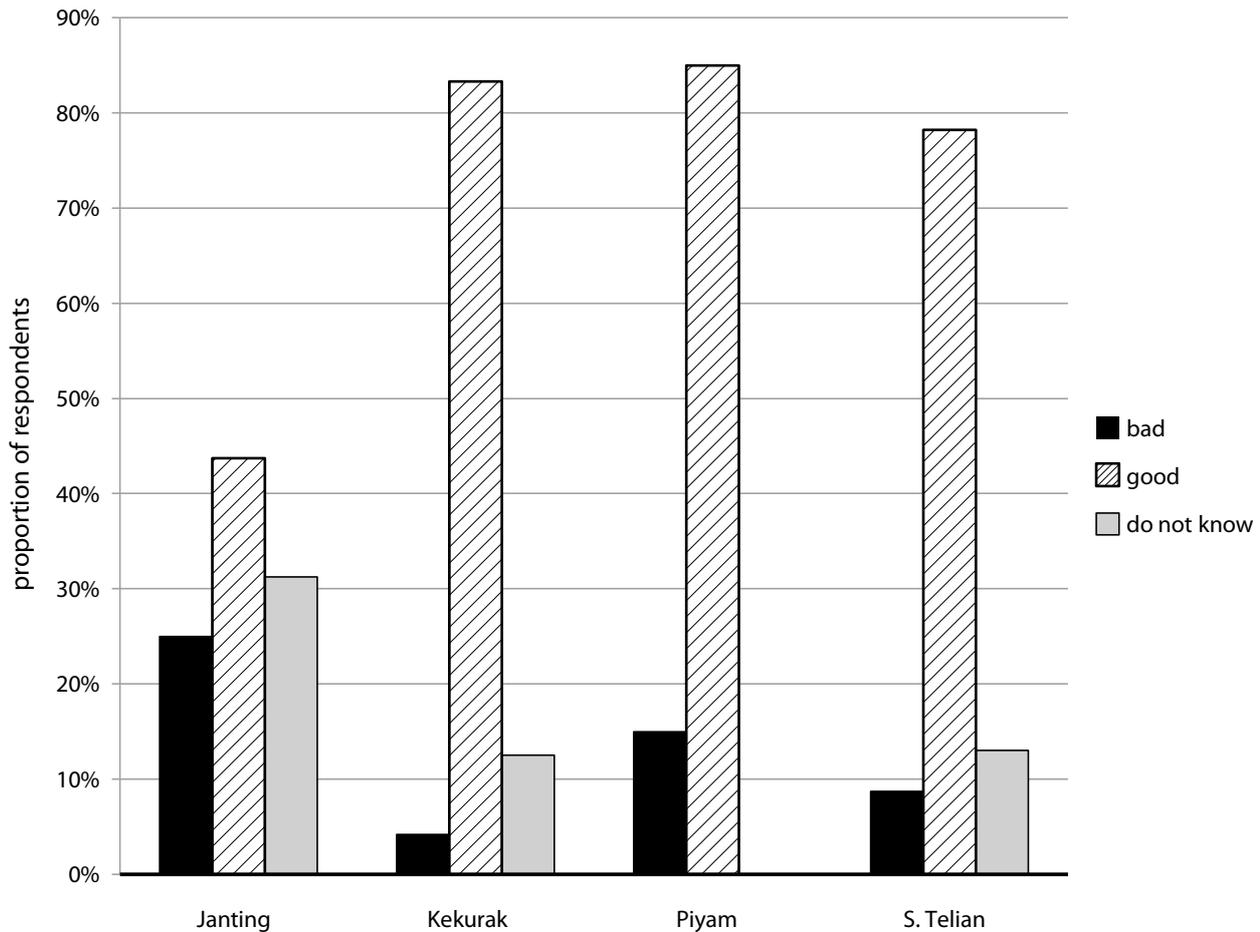


Figure 8. Respondents' perception of the oil palm company

- community development projects: the company would help villagers in their village infrastructure projects (schools, houses, water, etc.), according to the needs and requests of each village.

#### Conflicts between one village and the oil palm company

The village of Janting is in conflict with the company, which is reflected by the higher proportion of respondents judging the situation to be bad (Figure 8). As explained above, the company worked on an area that is both claimed by Janting's leaders, who rejected the oil palm plantation, and the people of the neighbouring village, Semuntik, who accepted it. The conflict remains unresolved, a situation the leaders of Janting explain by the collusion between Semuntik, the oil palm company and the State. They themselves feel helpless. In this case, the confusion created by the legal pluralism characterising the institutional environment and the absence of official maps delimiting the boundaries of the territory

of each village clearly played against Janting, and allowed the company to overcome Janting's refusal.

The oil palm company first proposed an arrangement with Janting to open a plantation, but they refused because the company failed to provide a written guarantee of benefit sharing and land rights security:

Until the end of my life, I don't accept because there is no arrangement or agreement with them. No, there is no agreement with the oil palm people. Later, it's like this, if they make a written agreement, a written contract, describing how it is going to be with the community, I agree!

(Janting's *kepala dusun*, J2)

Why did Janting refuse when the other villages accepted the oil palm company's proposition? The costs and risks associated with oil palm development on their land were higher for Janting than for the other villages, mainly because of the higher pressure

on their lands. Janting was one of the most densely populated *desa*. The impression that land was scarce was much higher in Janting than in the other villages, with 44% of respondents perceiving that land was or would be scarce in the future compared to 10 to 20% for the other villages (Fisher's exact test,  $p < 0.05$ ).

In addition, some of the village leaders, especially the *kepala dusun* (J2) seemed to have received a lot of information about the social and environmental impacts of oil palm plantations in other parts of West Kalimantan:

But they say this, here in Janting, or in Badau: 'we will do it like this'. Later they go back there [to their office], they change the arrangement, in a way that is inappropriate to the agreement with the community, because we know that a lot already happened there, in the region of Sanggau. There, there are many oil palm plantations, but people complain a lot! So the deception is like this: they use our land, 5, 3 or 10 ha. With each family head they have an agreement. Later, they farm, they get all the lands of the people; if they farm 10 ha, the people get 2 ha. The company farms these lands. So, people say, they go to the bank to borrow money. But the people don't know the way the oil plantation company works, how their finance is. The people never ever saw it. They [the company] claim 1 million Rp for this, 10 million for that, or even 100 million, but the people don't know, this is the debt of the people, 100 or 50 million Rp, for each family head, for A, for B, debts to the bank. 'You have to pay, because these are the costs to work your land, to plant it...' it is very obscure. But the people have to pay.

So this is what happened in Sanggau... and you think it is going to be the same here?

Yes, the same way, because these companies all originate from the same group, Sinar Mas. Here, they are called... Tunas Jatra. But the one who talked before with the people, this is Sinar Mas. They say that they do agreements to get the land, but they get them by force and later they give it to the company we have here, PT Tunas Siatrai. But it's Sinar Mas who make a fool of the people, later it will be the same, because I read this book from Wahli, and I have understood the way they act, the people of Sinar Mas, or even of the other companies, it's the same.

(*kepala dusun* of Janting, J2)

While it is not certain whether Janting's leaders were already in contact with NGOs before they made the decision to reject the oil palm plantation, this information fed a high mistrust of the oil palm company.

Finally, from the point of view of the people of Janting (or at least, their leaders), their position in the action arena is characterised by a high (perceived) risk of loss of benefits and dispossession from their land because of their distrust of the oil palm company. Moreover, as they have relatively little land available and consider land scarcity problems as likely (because of the local demographic growth), they perceive the cost of such a loss in land as high. This interpretation cannot be generalised to the whole community of Janting as shown by individuals who were enthusiastic about the oil palm plantation in the village (e.g., respondents J3 and J14).

### The importance of trust in cooperation

At the beginning of the process many people were unsure. The region had already received three proposals for oil palm plantations, in the Piyam and Semuntik area. All of these attempts failed, which had disappointed the people. So their main concern was over the realisation of the plantation. Few opposed the plantation projects, but many were afraid that they would fail; that the land would be cleared and the forest destroyed in vain. It was some months before the villagers finally made a decision.

A critical aspect of this process was the building of trust between villagers and the company. The company had to convince them they were a serious organisation: being part of the Sinar Mas Group, the biggest in Indonesia, was a strong argument. They also promised to pay a good compensation to local people if the land was cleared and then abandoned. They screened a video in every village showing the example of the success of the Riau plantation (Sumatra). After the villagers accepted the arrangement, the company organised a trip to their plantations in Riau gathering the *patih*s of each village, as well as some *kepala dusun* and *camat*. This was so that the village leaders could verify the success of the plantation and the benefits gained from it.

The village leaders also played an important role in the process of building trust with the company, because of their social status. In all villages (except for the *patih* in Piyam), the relationship between the villagers and their leaders seemed to be good, in the

sense that the village leaders appeared to be trusted and their authority respected. The company met the village leaders first and more frequently than the rest of the villagers. The support of the leaders for the project probably influenced the decision of the other villagers.

It also appeared that the company offered gifts to local people. Although it was only mentioned by two or three people, the company employees used to bring food (sugar, pork, chicken, tea and coffee, etc.) to the villagers, when they came to meet with them. This was seen by the respondents as a form of bribery. Indeed, the company stopped these gifts when the villagers took their definitive decision.

### **Village and NGOs**

The villages that accepted the oil palm company had difficult relationships with NGOs (Riak Bumi, Wahli, Greenpeace, etc.). Before the arrival of the oil palm company, few environmental NGOs had tried to contact the villages. Two villages, Sungai Telian and Kekurak have territory that is partly included in the DSNP buffer zone. Surprisingly, the people of Sungai Telian and Kekurak were not aware of this before the oil palm company arrived. In Sungai Telian, they found out when they suggested that the company plant more lands to the east. The company answered that this was outside of their plantation permit because it was already part of the national park. The villagers worried that this would impact their right to use the forest inside the park, especially their right to clear it to grow rice. More generally, they were angry with the central State for not having consulted or, at least, informed them when determining the boundaries of the national park. The same feelings were found in Kekurak although a smaller portion of their territory is within the national park or conservation forest. Six respondents identified forest conservation measures as a threat to their land rights (T5, T5', T3', K9, K3' and T4).

The lack of participation of local people in the designation of conservation areas is primarily the consequence of the strategy adopted by the central State, yet people seem to consider the national park and conservation forests, the central State and the NGOs (especially Riak Bumi) the same entity, as if they were the same stakeholder. Some people even said that the forest there was owned by the national park, and when asked who the national park was, would answer Riak Bumi.

In addition to the discovery of the DSNP boundaries, the villagers became aware of the existence, purpose and potential impact of environmental NGOs on their land rights through the attempt of some NGOs to communicate with them and convince them not to allow oil palm plantations on their land. The strategy chosen by the NGOs proved unsuccessful.

For villagers, these NGOs were asking them to guard the forest without offering them financial compensation or alternatives. Some of them knew that funds had been created by Western countries to pay local communities to protect their forest, and they suggested that these funds did not reach the local people because the government and the NGOs kept the money for themselves. In addition, some village leaders accused the environmental NGOs of magnifying the impacts of oil palm plantations and defaming the company. They were particularly offended by a Greenpeace document showing village leaders crying because of the environmental impacts of oil palm, while their experience had been positive.

The resentment and incomprehension have two sources. First, the villagers perceived the establishment of conservation forests as something imposed from outside (the central government) on their own lands. Second, they were aware of the environmental motivation underlying the creation of the national park, some of them would even mention global warming in their own words ('they say that if we cut the forest, it will get hotter'); however, these concepts were disconnected from the immediate way they perceived their environment. They explained that they would not feel the negative effects of the destruction of the forest there, and considered that they were asked to protect their own forest for the benefits of other people. They considered that the government or the NGOs had no right to ask them to stop using these forestlands without granting them any compensation.

Contrasting with these conflicting relationships between the villages in favour of the oil palm plantation and the NGOs, Janting has a positive relationship with some NGOs (Riak Bumi, Wahli, Sawit Watch). The village elite had anti-oil palm stickers, probably from these organisations on their house doors, as well as various documents produced by them. In Janting's case, the villagers and the environmental NGOs have a common interest in

rejecting the oil palm company, which promotes their cooperation. The main resources offered by the NGOs are information as well as a platform to plead their case to international civil society. However, this strategy was not successful and Janting appears a weak actor when faced with the State and the oil palm company, as expressed by the *kepala dusun* of Janting (J2):

The government stands on the side of the oil palm company. But the people are small, they are lower people. They can't do anything. They are the rich people, the big people. You want to step on them, to threaten them; the people can't do things like that. Maybe if the Iban people want to unify and cooperate to challenge the government, but they [the government and the oil palm company] won't listen, they will just use their strength, they will send the police, the army. That's why I wonder what the solution is.

### 3.6.2 Conflicts and cooperation inside villages

That one village officially agrees or disagrees with the oil palm plantation can hide internal conflicts and power configurations among villagers that may also impact the tenure security of the individuals.

#### Occurrence of land-related conflicts

The first finding is that in most villages the number of intra-village current conflicts is not higher than in the past, which suggests that the land transfer to the company has not triggered many conflicts. This is not true for Piyam, however. The majority of conflicts over land inside the villages are related to unclear boundaries between plots, or people burning a plot (to cultivate it) that is later claimed by someone else.

The degree to which individuals agreed with the decision to transfer land rights to the oil palm company is also critical as this implies low tenure security and may also be a source of internal conflicts.

#### Participation in the decision-making process

In Kekurak, Piyam and Sungai Telian, the respondents were systematically asked what their initial position on oil palm plantation plans was. The majority supported the proposal, although in Kekurak and Sungai Telian many also had doubts. In Janting a high number of respondents gave no answer; however several villagers were interested in engaging with the oil palm company.

Within the villages, the decision process to allow the oil palm plantation was participative. It was led by village leaders in consultation with the local people and required their approval. Internal meetings were regularly organised until a common agreement was achieved. Each household would send the family head to these meetings. The final decision to allow the oil palm plantation was only reached when all household representatives approved it.

Part of the land transferred to the company was commonly owned forest land. The household heads and village leaders decided which should be kept and which could be cleared and planted. This decision was based on the cultural and economic value of the *pulau*, which was usually clear.

The social norm promoting consensus and harmony inside the community is probably a strong incentive for the village leaders to integrate the opinions of the other villagers into the decision-making process.

Many people suggested that they would just follow the others and in some cases, the opinion of the majority seemed to be the only criterion on which they would base their decision. Probably because of the local social norms related to harmony and order inside the community, people tended to accept and yield to the majority.

Few individuals tried to oppose the plantation plan (except in Janting) and to avoid internal conflicts, people with the minority opinion generally ended up following the majority.

#### A land designation process requiring coordination and cooperation

The first element delimiting the potential plantation area was the permit issued by local government. Inside the permit area, the company would ask for use rights transfer from each owner.

Three kinds of lands were transferred to the company: private fallow lands, 'empty lands' (with no owner) and commonly owned forestlands. Once the villagers took the general decision to allow the company onto their land, they had to designate which plots could be used by the company inside the permit area. In order to organise and coordinate this process, the company asked each village to create a 'UPA' (*Unit Pelayanan Anggota* – service unit for the members of the cooperative) and designated the leading group of the UPA who would function as an interface between the company and each individual

land owner. The UPA would also meet with each family head owning land inside the permit area and ask them if they were willing to allow the company to work on their plot. When selecting the land, the villagers had to coordinate and met frequently, to establish a continuous block of land for the company. This process is ongoing as more land is transferred to the company.

### **What happens if someone doesn't want to transfer their land?**

Many respondents insisted that the company did not force them to give up their land. If there is fallow land that the owner wants to keep, and if this land is surrounded by lands that other people own and want to give away to the company, the fallow land is 'enclaved' (i.e., the company will record its GPS position and will leave the land untouched).

However, a few respondents felt compelled to give away their land. One explained that his plot was too small to be preserved as an enclave and was not attached to any block that was enclaved. The others were afraid that they would not be able to control the fire from burning their fallow land and would damage palms, which would mean they would have to compensate the company.

### **Individuals' degree of control in the decision-making process**

That the whole village participated in the decision to transfer the land to the company does not mean that each villager had the same degree of control over the final decision.

First, the village leaders seemed to have the strongest influence on the decision, through their influence on individuals. This is related to the fact that most villagers recognised their authority and apparently considered them the most able and skilled in the village when it came to making collective decisions.

In addition, some people felt compelled to give away their land because the surrounding plots were to be planted. People owning lots of land inside the plantation permit boundaries, therefore, likely had more influence in the process.

People who did not own private land also had less control in this process, it also seemed that they were less involved in the decision-making process on the question of common land. However, none of the villagers complained that the oil palm plantation

reduced their access to the forest, and most households had plots inside the permit area.

The groups with less control in decision making were women and young people. Most of the meetings involved the head of the household who was a woman only in exceptional circumstances. The low participation of women in the decision-making process is related to the social norms delineating roles and responsibilities of men and women.

In summary, gender, age, social status and number of plots owned appeared to be the main assets affecting the degree of control each individual had on land use rights transfer to the company.

## **3.6.3 Change in the distribution of land rights**

### **Transformation of villagers' rights**

The villagers understood that the company was only renting their land, which means that it had use rights to these lands for the next 25 to 30 years (duration of the productive plantation period). On the land that has been planted, villagers lost their direct use rights, but these have been partly replaced by a right to receive a rent from them. The agreement established between the local people and the company suggests that local people's rights of exclusion and alienation are 'frozen' for the duration of the contract. The villagers are still considered owners of the land, and they expect to get their plots back at the end of the contract or to choose to let the company replant.

The next sections analyses more precisely the transformation of two fundamental rights: the right to benefit from land and the right to manage it.

### **Rights to benefits from the land**

For each hectare that was transferred to the company, the owner received IDR 250 000 as *simpak beliung* (compensation for the labour they or their ancestors invested in clearing the land). When the owner has a certificate, he or she receives IDR 700 000 and when he has a 'land ownership letter' (SKT, or *Surat Keterangan Tanah*), he or she receives IDR 500 000; however, this was not widely known and was only mentioned by one respondent. This difference of compensation is a consequence of the institutional environment granting a stronger legal recognition to titled private property rights than undocumented and customary land rights (in this case, the institutional environment is not favourable to the villagers).

The villagers decided to divide the benefits received from the company for common lands, so that each family head (in Sungai Telian and Kekurak) or each household (in Piyam) would receive the same amount of money from these commonly owned lands.

The right of the land owners to the stream of benefits derived from the land is partly conserved, in the sense that for 20% of the area that has been transferred to the company, the owner receives the net benefits from the extraction of the fruits. This part of the planted area is called 'plasma' plantation. For the rest of the plantation, (80% of the total planted area), the benefits go to the company.

The community benefits will be shared according to the number of hectares each family house has given away to the company. In addition, each family head (in Sungai Telian and Kekurak) or household (in Piyam) will receive benefits associated with the common lands. Although no document was signed to guarantee a fixed or a minimum amount, the company used the example of its plantation in Riau, Sumatra, to convince the villagers; there, each hectare of plasma plantation generated a net benefit of IDR 2 to 3 million. In Riau, each household possesses 1.8 ha of plasma plantation, which means that each household receives IDR 4 to 5 million each month. A cooperative regrouping all villagers owning part of the plasma plantation (from the transfer of their own private land or common lands) will be responsible for the redistribution of the benefits according to these rules.

The right of villagers to get benefits from their lands has been at least partly conserved, at the level of the village and the individual. However, the distribution of benefits between the oil palm company and the communities (80% and 20%) is highly unequal, and the costs the company has to bear for the rent of the land are very low.

The whole plantation (both plasma and non-plasma plantation) is managed and grown by the company, but the costs associated with the management of the plasma plantation have to be reimbursed to the company by the cooperative (so, indirectly, by the land owners).

During the first 4 years, the plantation will be unprofitable because it will not yet be producing fruit. The costs are paid on credit by the cooperative

to the company (the supervisor of the cooperative estimated the debt to be IDR 47 million for each hectare). When the plantation becomes productive, the costs associated with the care and harvesting of the plasma plantations, the management of the cooperative, as well as the payback of the credit are deducted from the profits earned by the sale of the harvest. The money remaining (which is expected to be around 70% of the gross benefits) will then be redistributed to the land owners.

Thus the amount of money that villagers will receive each month corresponds to the net benefits generated each month by the sale of the yield in the plasma plantation, which means that the costs borne by the company for the plasma plantation will be deducted. Consequently, rental of villagers' lands by the company is virtually costless in financial terms, except for the IDR 250 000/ha paid at the beginning. However, most villagers accepted this fact, possibly because they perceived that they would still gain a net benefit from the oil palm plantation.

The next section analyses which interactions resulted in such an inequality.

### **The return of the State?**

Although none of the respondents mentioned it, the district government was developing a regulation limiting the area of the plasma plantation that each individual could register to their name to 4 ha, the rest being considered State land. Yet, a couple could register their share in the plasma plantation under the name of the husband and the wife, allowing them to own 8 ha. The villagers did not perceive this to be a threat to their rights because they could register their land under the name of others who had less than 4 ha already registered and who they trusted, and still be considered locally as their owner and receive the related benefits.

The practice of registering part of their land under the name of someone else while still claiming the benefits could trigger conflicts between the 'true' owner and the 'official' owner. This is an example of how the introduction of oil palm plantations can enable the local government to limit and modify the land rights of the customary owners. In fact, increased control of the State on the land after the leasing period could be a threat to long-term tenure security.

### Unequal bargaining power

The level of compensation for the transfer of use rights to the company was decided by the company itself, which is the result of the low bargaining power of the local communities. The two main factors influencing the negotiation process are the level of trust and the repartition of power. Here, the level of trust was relatively high (except in Janting's case), but the power unequally distributed between the company and the local community when it came to negotiation on compensation and benefit sharing.

Just one village, Sungai Telian, tried to engage in negotiations over the 20/80 ratio and *simpak beliung*. However, they finally accepted the initial proposal of the company.

Why did they fail in the negotiations? First, from the beginning they agreed with the oil palm plantation. Second, they did not attempt to agree a common strategy with the other villages to gain higher compensation. Third, some believed that compensation had already been agreed with the district government and consequently could not be changed because it had become a government rule. There was no official document but the villagers stated that the oil palm company had confirmed this.

In summary, the oil palm company actually asked permission of the villagers, and in doing so recognised their property rights to the land although these rights are not based on official property titles but rather on the local customary tenure system. However, the local people had very low bargaining power over the compensation associated with the right transfer, and were prepared to accept a strongly unbalanced share of benefits. This may be because they wanted to improve their economic situation.

### Decreasing access to forest resources and land

The oil palm plantation was established on forest lands mixed with fallow lands and villagers conserved some of their forests. Yet even converting fallow lands to a mono specific plantation is a radical ecological change and has environmental consequences. From the perspective of the common resources used by local people, the main consequence seems to be the decrease in game and fish. The decrease in timber appears to be also partly due to the land use change, but some of this stock had already been removed during the illegal logging period). In total, 66% of the respondents noticed a decrease in forest resources while 31% identified the oil palm plantation as a cause of this decrease. The more reliant people were on the forest, the more they observed a loss of

forest resources; that is, the impact of the oil palm plantation on forest resources was greater for those dependent on the forest.

Another phenomenon related to the arrival of the oil palm company is the 'monetarisation' of the relationship between villagers and their natural resources, as a food commodities market develops: villagers (and newcomers) getting an income from their work in the plantation tend to buy more basic goods than before (instead of searching and collecting them on their own). Consequently, a higher proportion of the non-timber forest resources, such as food products, are extracted to be sold. This trend, combined with the reduction of forest and woodlands, corresponds to a higher pressure on the remaining forest resources. This may have negative consequences on the households receiving the lowest income, which are more dependent on forest resources for their own subsistence.

Although most villagers think they still have enough land to grow rice in the future, some of them could face a land shortage. The traditional agricultural practices based on swidden crops are extensive and require more land than intensive techniques. The villagers have begun to use more inputs such as pesticides and fertilisers, but many still cannot afford such practices. Some households do not seem to have enough plots to continue the slash and burn practices without suffering decreasing yields.

### Satisfied but vulnerable right holders

Despite the highly unequal sharing of benefits between the company and the villagers and the loss of valuable forest resources and land for some individuals, many people are satisfied with the current situation, which explains the absence of conflicts with the oil palm company (except in the case of Janting).

The first benefit mentioned is the new source of income generated by the work opportunities in the plantation. Many complained that they were not sufficiently remunerated, but said that it was much easier to find money now than it was before. Working in the plantation also provides a guaranteed and stable source of income. With this new source of income, people tended to cultivate less land but still maintained some agriculture. They believed they still had sufficient land to cultivate and, because they had chosen which land to turn over to the plantation, the lands they kept were the nearest and most convenient.

Some households appeared to be 'vulnerable' with fewer than ten remaining plots (for a rotation system based on 10 years). However the projected income from the oil palm plantation for these households far exceeded that which they would have gained from the land they gave up.

Interestingly, most people impacted by the decrease in forest resource did not complain about the oil palm plantation nor did they feel their right to the forest was threatened. No significant difference was observed between the perception of the company and those who were dependent on the forest or those that used it little.

Similarly there was no significant correlation between the impression that forest resources were threatened and the observation of depleted forest resources. This analysis highlights the fact that while many respondents observed a decrease in forest resources and land, they do not perceive the oil palm plantation as a threat to their land rights and access to the forest. They actually receive other benefits in the form of wage labour and also the promise of high financial return when the plantation becomes productive.

In addition, they did not consider the land transfer to the company and the related destruction of some of the forest resources had been imposed on them, because they made the decision to hand over lands. As a consequence, except for some respondents in Janting, the villagers do not consider that their land rights have been threatened or violated by the oil palm company.

### **Unequal access to benefits and strengthened local elites**

In the majority of the villages, the relationship between the villagers and their leaders seemed to be rather good. However, because of their status, leaders tended to get more information and benefits from the company than the other villagers. Apart from the future managers of the cooperative, the only villagers taken to Riau by the company were the *patih*, except in Kekurak where the *kepala desa* was also included.

Since the villagers gave their plots away, company representatives no longer visit the villages, but only meet with the representative of the cooperative and local leaders. Most villagers do not know what is discussed during these meetings.

In Kekurak, the local elite (*kepala desa*, *kepala dusun*, *patih*) received a special wage from the company (IDR 2 million each month), to compensate them for their assistance, which was frequently requested. However, this was kept secret from most villagers.

In Piyam, the relationship between the *patih* and his siblings and the other villagers was poor. This village is characterised by its rather small population and contrasting differences in wealth. The *patih* and the former *kepala dusun* (the *patih*'s brother) were regarded as corrupt because of their involvement in illegal logging. Today, the *patih* is still thought to be demanding bribes from the oil palm company. Nevertheless, no action has been taken to change this situation.

Interestingly, in Janting, where the oil palm company was rejected, the local elite appear to have lost some of their authority. For example, one villager (J3) organised a meeting to try to convince others to accept the oil palm plantation, undermining the *kepala dusun*, *kepala desa* and *patih*. The *kepala desa* of Janting stated:

There is one man who wants oil palm plantation here. At the beginning, he didn't want it, but now he does! If I make a metaphor, it's like if we were at war. If we got killed, he would flee. So he already organised meetings with the people here, without telling me. Once he wanted me to come, but I didn't want to come because this is not my business, plantations. Because he wants to manage it, he gathers the people. If it was my business, for sure if the company came here, it would be opened to all the people. But in somebody else's place, it's not the village administration, just usual people. For me, they have no right to do this. We are useless as a village administration, if we are not seen by the people, if the people don't care about us. Because it's us who are entitled, us who receive wages, us who manage the community, it's the will of the people.

In addition, another villager was taken to Riau by the company; he invited the villagers that favoured the plantation to watch a video describing the success there.

### Management rights transformation and impacts on access to benefits

The extent to which the villagers can control the management of the plantation is an important factor affecting their tenure security in the sense that it reduces the probability of misappropriation (by other villagers, the cooperative or the oil palm company) of the benefits generated in the plasma plantation.

It is clear that, during the leasing period of 25 to 30 years, the oil palm company will have the management rights to the core plantation. For the plasma plantation, the management rights are exercised by the cooperative, as the entity representing the owners of the land, but are restricted in the sense that the land is designated for oil palm plantation only. The villagers consequently retain limited management rights on 20% of the land they handed over, but not directly, through the cooperative. As the interface between the company and the local communities and as the structure responsible of the financial management of the benefits derived from the plasma plantation, the cooperative is assigned a critical role in the tenure security of the villagers. The importance of the management of the cooperative has also been emphasised in other case studies on the impacts of oil palm plantations on local communities (Rist *et al.* 2010).

A low degree of trust between the communities and the cooperative can create conflicts between them, a situation the oil palm company tends to manage by directly taking over the complete management of the plasma plantation, thus decreasing further the degree of control the villagers can have over it (Feintrenie *et al.* 2010). But even a situation with a high level of trust between the communities and the cooperative can threaten tenure security if the cooperative captures a part of the benefits or is not equitable in redistributing them. This is why the degree of information given to the land holders and the accountability of the cooperative are critical.

Regulation mechanisms have been designed by the company to ensure good management of the cooperative. Although the current and first cooperative leaders were not elected, the leaders of the cooperative will be elected by the landowners once the palms are productive. The cooperative also includes a supervisory panel, separately elected, who will be responsible for the compliance of the cooperative to the contract established with the company, and will be entitled to have it audited by the company.

Nevertheless, the highly unbalanced distribution of information involves a risk of elite capture by the leaders of the cooperative and of manipulation of the cooperative by the company at the expense of the local communities. Under such circumstances, it can be expected that villagers' access to the benefits from the oil palm grown on their land will depend on the goodwill of the cooperative leaders. To what extent will they commit themselves to protect the interests of the villagers?

### 3.6.4 Rules and promises

The enforcement of rules and fulfilment of promises concerns the arrangement between the oil palm company and the villagers. Because the plantations have only been recently established and are not yet mature, the outcomes of benefit sharing can only be hypothesised. They will partly depend on the management of the cooperative and the control the local communities can have over it.

In general, the oil palm company respects the boundaries of the land the communities have handed over. There are only a few cases where it has encroached on the land the local people wanted to keep for themselves, mainly in Piyam.

The UPA and the cooperative are responsible for supervising the activities of the company on the ground and ensuring that the lands the villagers designated as enclaves were not worked on by the company. In Sungai Telian, the leader of the local UPA, who was also the *kepala dusun*, explained that he went to the plantation every day to check that there was no encroachment into the enclave lands. He considered that without this control, the staff of the company would probably damage these lands:

From the beginning until the end, I go to the field, in the area where the company works... What do you go there for?

To guide the people there, from the beginning to the end. That's why I have to go there every day now. I'm afraid they work on the lands that are 'enclaved', that are not handed over.

(Respondent T15)

The supervisor of the cooperative, who was living in Kekurak and was involved in the supervising activities there, made similar comments.

A final aspect that could endanger the land rights of the villagers in the long run is the question

of ownership of the planted lands after the leasing period, and of the related rule that will be enforced. It is clear that, according to most villagers, the oil palm company promised to give their land back at the end of the productive period. However, the absence of land titles, combined with the ambiguity created by the legal pluralism characterising the institutional environment introduces the threat that the customary owners may lose their land if the government claims ownership. This was perceived by few respondents.

It is rather unlikely that villagers will lose their rights on the plasma plantation because the cooperative is supposed to document their ownership, but it may happen with the core plantation area.

The measure taken by the government to limit the plasma plantation to 4 ha per individual is an example of how the introduction of oil palm plantations can allow local government to limit and modify the land rights of the customary owners. In addition, cases of appropriation of the planted area by the State following unclear agreements between local communities and the oil palm company have been reported in other areas (Feintrenie, personal communication; Colchester *et al.* 2006, Marti 2008, Rist *et al.* 2010).

### 3.6.5 Ability to defend one's right and perceived tenure security

The ability of the individuals to keep their land rights is a key dimension of tenure security and individual assets such as social position and information and knowledge are important factors enabling a right holder to defend his or her rights, especially in the context of undocumented, customary land rights. As explained before, most villagers did not possess land titles and the only titles that were affordable were the SKT which grants a lower official recognition than fully registered rights through the *sertifikat*.

#### Some cases of internal threats to land rights

While in the three villages that accepted the oil palm plantation most villagers voluntarily handed over their land, some saw their rights threatened by other villagers who gave away the land they were using without their agreement or without sharing the benefits from the *simpak beliung* with them. In this case, they tended to resign themselves to their loss, possibly as a means of avoiding dispute.

The case of respondent P7 is interesting. She was a 35-year-old unmarried woman living in the *bilik* next to her parents' *bilik*. Although very shy, she confessed that the development of the oil palm plantation made her farming work more difficult because she was only left with fallow lands that were far from her house. The closest one had been handed over to the oil palm plantation by her father.

In Sungai Telian, respondent T6 complained that she lost access to farm on very productive nearby fallow land. She had received this plot from her parents as common property with her brother, because he was currently staying in the familial *bilik* he was responsible for the management of the lands held in common with his siblings. He handed over part of these common plots to the company without telling T6. Although she was angry with him, she seemed resigned to the fact that he was the one entitled to make decisions about this land.

Two similar cases were encountered in Kekurak. These cases presented here share the common fact that the people losing some of their rights or seeing them reduced were resigned to the situation.

#### Perceived tenure security

Surprisingly, most respondents did not feel any threat to their land rights (only 9 respondents felt their rights were insecure). They seemed to trust the company and some of them were expecting to receive land titles from the company. Most people considered the verbal promises made during the socialisation phase a reliable guarantee. They also thought the government or the company would not dare to challenge their land rights and they expressed a strong feeling that they, as individuals (for their private land) or as a community (for the common lands), were the real owners of the land.

Yet, some people were concerned by the lack of written archives attesting to the arrangements made between each land owner and the oil palm company. They suspected that in cases of conflict with the company the villagers would not be able to provide proof that they were the actual owners of the lands, and that the company recognised them as such when the agreement was made. One man also suspected that the lands would not be given back to their initial owner but to the State at the end of the contract period.

### The issue of information and documents

The difficulties faced by Janting in defending its rights show the potential vulnerability of the villagers when they face an external threat coming from an actor as powerful as the oil palm company. None of the villagers had any signed, written contract specifying the arrangement with the company and very few villagers actually knew how the plantation, and the plasma plantation in particular, would be managed. Most people were not aware of the 20/80 rule for benefit sharing, and even fewer respondents understood the exact role of the cooperative.

The strategic position of the cooperative appears when considering tenure security through the lenses of documents and information about the land transfer contract. The main people with details on the arrangement with the company were the members of the UPA and the cooperative leaders. The few individuals who knew the reasons for the absence of written contracts explained that these documents would be created once the plantation was productive, and that they would be kept by the leaders of the cooperative. The villagers could then ask for copies but would not be given the original documents. According to the supervisor of the cooperative, the ground contract framing the arrangement between the company and the villagers was the Memorandum of Understanding contract, which determines the modality of the attribution of use rights of the land to the company. He explained that this contract had not been signed between the company and the local community, but between the company and the cooperative leaders as representatives for the villagers.

The cooperative supervisor stated that the absence of individual contracts had been decided at the level of the district in order to prevent individuals from directly bearing the burden of the debt associated with the first unproductive years of the plantation. He cited the example of another district in West Kalimantan where individuals were not able to pay back the credit and were finally compelled to sell their land to cover their debt.

Yet, the majority of the respondents were unaware of this information and this may undermine their ability to defend their rights, especially in case of conflict with outsiders or the cooperative. It is possible that more information will be shared when the oil palms are productive, but this is not guaranteed. There appeared to be a lack of any information-sharing process. Most villagers seemed to accept this.

Three factors influenced the degree of information individuals had:

- Gender: women tended to be less well informed on the issues related to the oil palm plantation;
- Relationship with the company: people who frequently met with the representatives of the company would of course have more information (cooperative leaders, UPA members and village leaders);
- Level of education: people with higher education tended to be more informed about the agreement with the company, and also about the official regulation and what happened in other regions of Indonesia.

Because of the social value attributed to education, the criteria used to select cooperative and UPA leaders, and the greater opportunities of exchanges with outsiders a better education allowed, most people who were close to the company were also better educated than the others.

## 3.7 Main findings and limitations of the study

Tenure security was studied by analysing the patterns of interaction in the institutional analysis and development framework. These were identified as indicators, dimensions of the security of a land right; namely, the degree of conflict and cooperation among actors, the actual distribution of rights, the degree of enforcement of rules regulating land rights as well as the ability of the right holder to defend his or her right. In fact, the degree of control the right holder has on the process of land rights allocation is a key element characterising the action arena. It affects the ability of the right holder to maintain and defend his or her right, and consequently the actual distribution of the right (in particular, the probability of losing it).

### 3.7.1 Apparent win–win cooperation

From the perspective of conflict and cooperation, the main finding is that the majority of the villages had a good relationship with the oil palm company and voluntarily handed over their land. Apart from the case of Janting (which is also debatable), this study does not support the accusation that the establishment of oil palm plantations systematically involves land grabbing.

The system of benefit sharing proposed by the oil palm company to the local communities, as well as the related working opportunities convinced them to entrust their land to the company, despite their experience of repeated and failed oil palm projects. That they were apparently given the authority to reject or accept the oil palm company's operations on their land and to designate which land would be handed over also improved the social acceptability of the oil palm plantation and allowed them to preserve and maintain their control on the enclave lands.

Trust played a critical role in enabling cooperation between the oil palm company and local communities. By proving benefits for the local people with the example of Riau, involving the local leaders and making verbal promises in front of the whole community, the strategy of the oil palm company to build trust was successful, except in Janting.

### **3.7.2 Emerging in the context of a highly unbalanced constellation of power**

The allocation of lands to the oil palm company was also the outcome of a negotiation process between actors (the company and the village) with highly unequal power.

The confusion created by the institutional environment because of ambiguous national regulations on the status of customary rights puts the local communities in a weak position in front of outsiders. The oil palm company has used this to work on some lands despite the refusal of their claimed owners, as shown in the case of Janting. In fact, the actor represented by the government tends to be an ally for the oil palm company, thus reinforcing its power.

The oil palm company also derives its power from its assets, namely its high investment capacity and high access to information, in contrast to local communities. Moreover, the absence of alternative income-generating activities able to compete with the promised (and demonstrated) economic benefits of the oil palm plantation further reduces the bargaining power of the villagers.

Nevertheless, the oil palm company is not free from any constraint. Conflict with local communities has a prohibitive cost for the company, both in direct financial terms but also in terms of image. Here, the actor represented by NGOs, especially international

NGOs, is an indirect ally for local communities (as shown for example by the closer relationship between Janting and some NGOs). By mobilising to increase consumers' awareness of the social and environmental impacts of palm oil production, they modify the demand of the oil palm market towards more sustainable products.

The outcome of the interaction between the position of the oil palm company and the local communities is an agreement satisfying most villagers, while at the same time restricting their right to the stream of benefits to only 20% of their initial land.

### **3.7.3 The importance of individuals' control over the land allocation process**

The social norms of the communities promote a decision-making process based on consensus, which enabled a representative of each household to participate in the decision over the oil palm plantation. In addition, the landowner's right to decide whether or not to hand over the land was recognised, although limited.

However, some individuals lost their use-right because of the transfer of the land to the oil palm company by another person, and the decision-making process excluded some categories of villagers, especially women, thus indicating a lower tenure security for these actors.

### **3.7.4 Uncertain future and tenure security**

The question of ownership of the planted land after the leasing period is critical in assessing the long-term tenure security of local communities. The scenario of the State taking over the whole oil palm plantation appears rather unlikely, because the villages are located in a strategic situation, along the border with Malaysia, where concerns about national security are an incentive for the government to avoid conflicts with the local population. However, it is likely that the local communities may lose part of their land.

Finally, the central role of the cooperative in the management of the plasma plantation suggests that the tenure security of the villagers will strongly depend on this new institution. The localisation of information with the cooperative leaders (and to a lesser extent with the village leaders) and the tendency of the village leaders to reap more benefits from the oil palm company than the other villagers indicates that there could be a risk of elite capture of information and benefits from the plasma plantation.

The extent to which this could threaten the tenure security of the villagers is beyond the scope of this study. Yet, from a theoretical perspective, elite capture is a factor that potentially reduces tenure security for the non-elite right holder because it may reduce the ability of the local authority to defend the right in cases of conflict.

In any case, the assurance that the villagers will not lose part or all of their land rights in the future depends on their capacity to make the oil palm company honour its commitment to avoid elite capture of information and benefits, and to control the activities of the newly created cooperative.

### 3.7.5 Limitations and practical difficulties

From the perspective of intra-community dynamics, data collection was limited by various constraints, mostly related to language and trust problems. The limited time spent in each village made it difficult to overcome these by convincing them of the neutrality of the study and establishing a more trusting relationship.

The majority of interviews were rather strongly structured and lacked spontaneity, partly due to language problems and partly due to the sensitive nature of many of the subjects discussed.

Social conventions also presented a difficulty, for example, women were reluctant to be interviewed without the presence of a male representative, to whom they tended to defer.

Time limitations meant the study focused only on intra-village dynamics, a more complete picture of the land tenure issue would be gained by interviewing external actors and reviewing official documents.

The empirical results of this study present a snapshot of one area and care should be taken in extrapolating the results to other communities; however, it is a useful contribution to the literature and could be combined with other case studies to give a broader picture of land tenure problems.

It would also be interesting to follow the current situation to examine how it develops and the final outcomes for the villagers and their land rights.

## 3.8 Conclusion

The oil palm company's interactions with Iban communities in Kapuas Hulu does not reflect the scenario of violent land grabbing described by several NGOs, but several threats to local people's land rights have been identified. This study will contribute to a better understanding of the impact of oil palm plantations on local communities' tenure security and to the designation of policies able to minimise the negative social impacts of oil palm plantations while maximising the positive ones. Such policies are essential because oil palm plantations are likely to increase, especially in Indonesia (Feintrenie *et al.* 2010).

From a scientific perspective, this work constitutes the first attempt to apply the institutional and development framework to the issue of tenure security. It aims at understanding how intra-community social dynamics interact with factors external to the community, in terms of tenure security for the community members.

The institutional and development framework is broad enough to include many potential variables that can influence land rights security, which is particularly useful for the study of tenure security as it is expressed under many different forms and impacted by many different factors according to context. Another advantage of the institutional and development framework is that it takes into account the dynamic aspect of the issue of tenure security and how the factors affecting it can in turn be influenced by tenure security, in a direct or indirect way. Finally, the right holders are not presented as powerless and passive individuals who are subject to their environment, but they are integrated as actors whose actions also impact tenure security, other actors and the biophysical and institutional environment.

This dynamic concept of tenure security calls for additional long-term research in order to understand more fully the mechanisms shaping tenure security and their evolution. In the case of the villages studied, it would thus be very interesting to resume the empirical study when the oil palm plantations are productive; in particular, to understand more precisely the role of the cooperative and the local social dynamic on villagers' tenure security.

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### Glossary

Property rights: rights corresponding to the power to 'command the State' (or a comparable authority system) to protect you and your interests 'on behalf of an asset of economic significance' (Espen Sjaastad and Bromley 2000). That is, 'an enforceable claim to some use or benefit of something' (Macpherson 1978).

Land rights: property rights equivalent to tenure and include the natural resources related to the land.

Bundle of rights: a set of rights comprising (Schlager and Ostrom 1992)

- right of access
- right of withdrawal, the right to extract products from the resource
- right of management, the right to decide how the resource is managed
- right of exclusion, the right to decide who can access the resource
- right of alienation, the right to transfer any of the other four rights.

Common-pool resources, commons: an asset which if consumed by one user reduces the amount available to others; restricting access to common-pool resources is difficult.

Tenure system: includes the bundle of rights of a land and its resources; the rules governing the attribution of these rights; the authority defining these rights; the means of enforcing these rights; and the interaction between these elements.

Tenure security: the certainty that a right holder will not be arbitrarily deprived of his or her right. It comprises the range of rights, their assurance and duration (Fuys *et al.* 2008).

# Annex 1

## RSPO criteria concerning customary land rights

**Criterion 2.2:** the right to use the land can be demonstrated, and is not legitimately contested by local communities with demonstrable rights.

**Criterion 2.3:** use of land for oil palm does not diminish the legal rights, or customary rights, of other users, without their free, prior and informed consent.

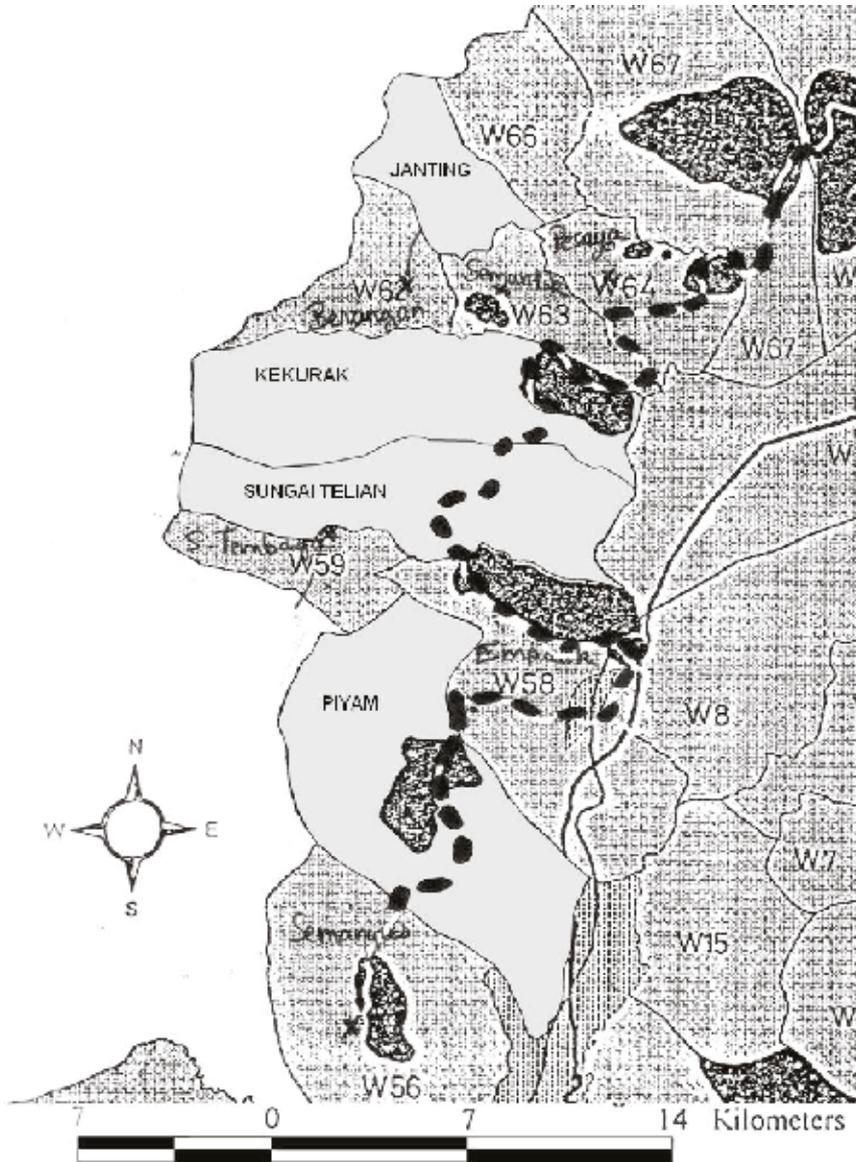
**Criterion 6.4:** any negotiations concerning compensation for loss of legal or customary rights are dealt with through a documented system that enables indigenous peoples, local communities and other stakeholders to express their views through their own representative institutions.

**Criterion 7.5:** no new plantings are established on local peoples' land without their free, prior and informed consent, dealt with through a documented system that enables indigenous peoples, local communities and other stakeholders to express their views through their own representative institutions.

**Criterion 7.6:** Local people are compensated for any agreed land acquisitions and relinquishment of rights, subject to their free, prior and informed consent and negotiated agreement.

## Annex 2

# Map of customary village territory



Source: Extract from a map created in 1997 as an outcome of the Indonesia–United Kingdom tropical forest management program led by the Overseas Development Agency and the Indonesian Ministry of Forestry



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The institutional analysis and development framework developed by Ostrom is adapted to the issue of tenure security. Findings from the literature are used to study the interaction between the biophysical and institutional environment, the characteristics of the studied community and of the different actors and to examine how the resulting 'patterns of interaction' influence tenure security.

This framework is then applied to an empirical study of the consequences of the lease of customary lands to an oil palm company on the tenure security of the local Iban communities, at the community and the individual level, in four villages in the Kapuas Hulu region of West Kalimantan, Indonesia. Eighty-eight semi-structured interviews with randomly selected family heads, their spouses and several key informants showed that the promise of the company to give back 20% of their harvest to the villagers convinced most villagers to hand over part of their lands in 2008 and 2009. Only one village refused the arrangement and was in conflict with the oil palm company.

The decision-making process to allow the company to use customary lands was based on consensus and involved the participation of all household heads, although the community leaders probably played an important role by their strong influence on the other villagers. Women appeared not to have been consulted. While most villagers had a perception of high tenure security, their land rights could be threatened by the incomplete recognition of customary institutions by the government, unclear regulations and the concentration of information and key documents by the local elite.

This research was carried out as part of the European Union funded Collaborative Land Use Planning and Sustainable Institutional Arrangements project. Run by CIRAD in partnership with CIFOR, TELAPAK and several local NGOs and Universities, the project aims to contribute to avoided environmental degradation and to strengthen land tenure and community rights by collaboratively integrating all stakeholders' views in land use planning processes. The outputs revolve around the relationship between land use planning, land allocation and the provision and potential payment of ecosystem services. The project focuses on two regencies (*kabupaten*), Kapuas Hulu and Central Maluku in Indonesia.

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